



HealthPathways: An evaluation of its implementation in five Australian Medicare Locals

Report prepared by Alison Boughey Consulting on behalf of AML Alliance – March 2014

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Australian Medicare Local Alliance

The Australian Medicare Local Alliance (AML Alliance) is a national, government funded, not for profit company. AML Alliance leads and supports 61 Medicare Locals – regional primary health care organisations which play a key role in planning and coordinating primary health care services for their respective populations across Australia.

AML Alliance is an advocate for Australia's primary health care policy setting and system. It works with a variety of stakeholders including general practice, health, aged and social care proponents to promote continuous improvement and excellence in the Medicare Local sector through evidence-based and innovative quality practice.

Led by a skills-based board, the AML Alliance works with Medicare Locals to:

- deliver better health services with general practice at its core;
- ensure service innovations are well promoted and advocated;
- provide the national connections to improve links between service delivery across the nation and Government policy;
- encompass the broader health sectors, including the social care and aged care sectors, to ensure gaps in services are filled and services are functional locally;
- provide accountability in the primary health care system; and
- support strategic partnerships with Local Hospital Networks (LHNs), general practitioners (GPs), allied health professionals, nurses, other health professionals and local government to improve their region's health system.

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1 Executive Summary

"It's an idea whose time has come – no-one could say the status quo is a good thing."

GP and HealthPathways team member

HealthPathways is a web-based resource for delivering high-quality information to primary care clinicians. Developed by New Zealand's Canterbury District Health Board (DHB) as part of a broad, health system transformation effort, *HealthPathways* has been adopted in Australia to improve integrated patient care through enhanced cross-sector collaboration and increased support for GPs. At the time of the evaluation, March 2014, it was being implemented by fourteen Australian Medicare Locals (MLs) and/or local health networks (LHN).

Implementation of the Australian *HealthPathways* programs is supported by the New Zealand-based technical communications company, Streamliners. Streamliners provides a web-based platform that houses assessment, management and localised service referral options as well as patient information and reference material that has been jointly developed by hospital and general practice clinicians. Website content is developed at the regional level in response to locally identified priorities.

The AML Alliance commissioned this evaluation of Australian *HealthPathways*' programs to:

- Map the implementation process
- Document any impacts to date and
- Inform the AML Alliance and the Department of Health (DoH) on cross-sector collaboration.

The evaluation was undertaken by Alison Boughey Consulting in partnership with five selected MLs currently implementing the *HealthPathways* program.

The evaluation found that:

- Whilst the drivers for *HealthPathways* implementation in Australia are similar to those in New Zealand, Australia's healthcare system is markedly different to New Zealand's. As a consequence, those implementing the program in Australia are both optimistic about its potential benefits, and cautious about predicting its impacts on the Australian system based on those observed in Canterbury
- The *HealthPathways* implementation process is relatively consistent across regions and each of the five participating MLs is at a different stage of implementation
- Measuring the impacts of *HealthPathways* in isolation of associated initiatives and activities is challenging and it is widely accepted that significant, system level impacts of *HealthPathways* will not be seen in the short term

- To date there is no evidence of an observable impact of the program on system performance indicators such as waiting times for hospital services or numbers of patients discharged from hospital ambulatory care clinics to primary care services. However, there is some evidence that the *HealthPathways* process has had impacts in the areas of:
 - Improving collaboration between acute and primary care sector clinicians
 - Improving clinicians' experience of patient care
 - Enhanced support for GPs
- *HealthPathways*' users can envisage the program leading to a range of potential benefits to patients, GPs and hospital specialists. Ultimately it is envisaged that benefits will flow through to the broader system
- Whilst most participants were positive about the program's sustainability over the next three to five years, a number of factors that have the potential to impact on its sustainability were identified including:
 - Clinician engagement
 - Maintaining resourcing
 - Data collection
 - Supporting ongoing cross-sector collaboration
 - Policy level engagement
- Whilst the current structural and contractual arrangements between Canterbury DHB, Streamliners and the MLs have worked adequately to date, further Australian interest in the program may provide an opportunity for these arrangements to be reviewed to enhance the program's sustainability and affordability in Australia.
- Despite the benefits identified by those involved, it is likely that not all MLs will find *HealthPathways* suitable for their region or may not be ready to implement it. As a consequence, there was a fair degree of unanimity amongst stakeholders that a national 'rollout' of the program would not be appropriate and that *HealthPathways* must be initiated and implemented at the regional level in order for the process to be effective. A need was identified, however, for coordination, support and evaluation to occur at a national level.

The evaluation identified a number of areas where there is potential for AML Alliance to add value and support to MLs throughout the implementation process through education and advocacy, supporting ongoing evaluation and working with MLs to negotiate contracts that enhance the affordability and sustainability of the *HealthPathways* program and support its broader uptake across Australia.

The evaluation recommendations are outlined in section 12.

2 Background to the evaluation

An increasing number of MLs, working in partnership with their local health networks (LHNs)¹ are recognising *HealthPathways* as a useful resource to streamline services, increase support for GPs and better integrate health care across sectors. To date, fourteen MLs have entered agreements with the New Zealand based technical communications company, Streamliners, to implement the *HealthPathways* initiative.

Whilst there has been positive anecdotal feedback on the *HealthPathways* initiative, at the time this evaluation was commissioned, little research or analysis was available on how well *HealthPathways* is working or on its potential impacts and benefits in the Australian context. With an increasing number of MLs expressing interest in *HealthPathways*, the AML Alliance considered it important that a systematic approach to evaluating the program's implementation to date be adopted. This will also assist the AML Alliance to determine what role, if any, it may play in supporting MLs to implement the *HealthPathways* program in their regions.

As part of a broad initiative to exam clinical engagement and cross-sector collaboration, the AML Alliance commissioned Alison Boughey Consulting to develop and implement an evaluation framework to examine the implementation of *HealthPathways* in five MLs across Australia.

2.1 Aims and scope

Through consultation with *HealthPathways* development teams and users, the aim of the evaluation was to map the *HealthPathways* implementation process and any impacts to date, to inform the AML Alliance and DoH on cross-sector collaboration.

The consultation was undertaken between September and December 2013 with its primary focus being the *HealthPathways* implementation process. A secondary focus was accessing relevant data held by the MLs that would assist in identifying impacts of the program to date.

2.2 Evaluation objectives

The objectives of the *HealthPathways* evaluation were to:

- Engage with five MLs that have commenced implementation of *HealthPathways* initiatives within their regions
- Evaluate the processes and approaches used by the MLs and their partners during *HealthPathways* implementation
- Identify the outputs of the *HealthPathways* projects

¹ In this report the term Local Health Network is used to describe Australian hospitals and health services.

- Identify any impacts that have resulted from the *HealthPathways* projects to date
- Identify barriers and enablers to the program's effectiveness
- Explore what it might look like if AML Alliance were to play a national role in rolling out *HealthPathways* (or an alternate model)
- Explore the possibility of an alternative model that could be supported for national roll-out
- Based on the evaluation findings, make recommendations to inform the AML Alliance policy area on cross-sector collaboration.

2.3 Methods

The following approach to the evaluation was adopted:

- An evaluation framework was developed by the consultant and endorsed for implementation by the AML Alliance
- The AML Alliance invited MLs that are implementing *HealthPathways* to submit an expression of interest to participate in the evaluation. The following five MLs were funded to participate:
 - Barwon Medicare Local (Victoria)
 - Central Coast New South Wales Medicare Local (NSW)
 - Hunter Medicare Local (NSW)
 - Inner North West Melbourne Medicare Local (Victoria)
 - Townsville Mackay Medicare Local (Queensland)
- Each participating Medicare Local nominated a key liaison person to work with the evaluation team to:
 - Participate in an initial interview
 - Recruit local stakeholders to participate in further interviews
 - Distribute an electronic survey to relevant participants across their regions
 - Follow-up survey responses to maximise participant numbers
 - Provide access to relevant documentation and data
- Telephone interviews were conducted with key personnel involved in the *HealthPathways* initiative from:
 - MLs and partner LHNs
 - AML Alliance
 - Streamliners
 - Universities working on concurrent AML Alliance clinical engagement and cross-sector collaboration projects.

All interviewees are listed in appendix one.

- An electronic survey was developed by the evaluators and distributed by the MLs to relevant stakeholders within each region

- Reports and documents provided by the participating MLs, including those located on the *HealthPathways* project management websites were evaluated as were a sample of *HealthPathways* web pages
- The evaluator participated in several workshops and conferences including:
 - A *HealthPathways* introduction and planning day hosted by Inner North West Melbourne Medicare Local and Inner East Melbourne Medicare Local in Melbourne in September 2013
 - A *HealthPathways* conference hosted by Streamliners in Sydney in October 2013.
 - A *HealthPathways* evaluation teleconference convened by the NSW Agency for Clinical Innovation (ACI) in January 2014.
- Statistical data on *HealthPathways* usage from two MLs provided by Streamliners was used to inform the findings on patterns of usage of *HealthPathways*
- Recommendations, based on the evaluation findings were developed to assist with informing the AML Alliance and DoH on cross-sector collaboration.

3 The *HealthPathways* initiative

HealthPathways is one part of a whole-of-system improvement initiative that has been developed in New Zealand and is now being implemented in Australia. One of the evaluation's key findings was that understanding the context in which the program was developed and the context in which it is being implemented are critical for understanding the program's potential impacts. This section provides a contextual overview to support that understanding.

3.1 The New Zealand context

The Canterbury District Health Board (DHB) is funded by the New Zealand Ministry of Health for planning, funding and delivering health, community and aged care to its population of around 500,000 people. The care it delivers covers the community, general practice, secondary, tertiary, disability support and aged care sectors. As well as providing services directly to the population, Canterbury DHB holds service agreements with private and non-government providers².

Driven by a converging set of economic, quality, workforce and demand pressures that have been described as a 'burning platform', since the mid 2000s, Canterbury DHB has been implementing a system-wide health and social care redesign initiative known as the "The Canterbury District Health Board's whole-of-system improvement initiative" (within this report, the initiative is referred to as The Canterbury initiative). The key drivers of the Canterbury Initiative were:

- Poorly connected islands of excellence across Canterbury's health and social care system

² Timmins N, Ham C *The quest for integrated health and social care: A case study in Canterbury New Zealand* The Kings Fund London 2013

- Increasing demand for services that were not being met as part of a 'business as usual' approach
- An ageing population and an ageing health care workforce
- Ongoing fiscal pressures including wage pressures and the escalating costs of delivering increasingly sophisticated health technology².

The Canterbury initiative is one element of a multi-faceted, comprehensive effort to transform the way health services are delivered. Developed by clinicians and service managers across Canterbury's primary and acute care sectors, it is comprised of a broad set of redesign elements that interact with and support each other. These include:

- A range of programs and initiatives aimed at reducing hospital length of stay and readmission rates and helping unwell and older people to remain in their homes for longer
- Changes in the way Christchurch hospital develops and manages its business to improve efficiency, reduce waiting times for patients and allow more care to be delivered in the community
- Twenty-four hour GP care
- An electronic referral system between GPs and other parts of the health system
- An electronic shared care record view
- A regionally integrated finance and funding system
- Implementation of data systems to measure performance relevant to the initiative's goals
- The *HealthPathways* website³.

The *HealthPathways* website was developed to provide consistent, high-quality information to primary care clinicians at the point of patient care. The website houses assessment, management and localised service referral options as well as patient information and reference material that have been jointly developed by hospital and general practice clinicians. Its purpose is to enhance patient access to appropriate care in the community, improve the standard of primary care referrals to acute care and where appropriate, eliminate the need for patients to be referred to acute hospital for their care.

As the information on the *HealthPathways* website is jointly developed by GPs and specialists working together, GPs and patients can be confident that the information will be relevant to their needs and based on current best-practice care for any given condition. The pathways are informed by evidence and kept up to date. *HealthPathways* is supported by a shared-administration system and expert technical writers who apply a consistent style to every pathway developed. Whilst *HealthPathways* is a significant element of the Canterbury initiative, it was not designed to be implemented in isolation of Canterbury's broader redesign effort.

In 2013, the Kings Fund in London published an independent case study of the Canterbury initiative. It reported that, since the commencement of the Canterbury initiative, Canterbury has seen:

³ Timmins N, Ham C *The quest for integrated health and social care: A case study in Canterbury New Zealand* The Kings Fund London 2013

- More cases across a wide range of conditions investigated and sometimes treated in general practice
- Improved productivity by GPs and hospital specialists
- GPs doing more work up on patients and referring less
- Hospital specialists seeing more complicated patients and less patients who could be managed by their GP
- Improved access to hospital patients who need to be seen there
- Standardised care from one GP to another
- Indications of a more integrated health care system, more activity outside the hospitals and a shift of resource utilisation from acute to community care
- Reduced emergency department (ED) presentations and increased elective surgery.

Given the Canterbury Initiative's notable achievements, it is not surprising that it has attracted growing international attention and that Australia is one country watching the performance of its close neighbour with interest. This is even more understandable in the context of Australia's own health system reform trajectory.

3.2 The Australian context

In 2008 the National Health and Hospitals Reform Commission was established to address a set of challenges facing the Australian healthcare system that were not dissimilar to the challenges identified by the Canterbury DHB at around the same time. These were:

- The rapidly increasing burden of chronic disease
- The ageing of the population
- Rising health costs
- Inefficiencies exacerbated by cost shifting and the blame game⁴.

In its 2009 report, the Commission noted that, 'whilst the Australian health system has many strengths, it is a fragmented system under growing pressure to meet the increasing demands of a population with changing health needs'. Amongst a number of reform goals, the Commission identified a need for better connected and integrated health and aged care services through a strengthened primary healthcare system⁵.

Following this, in 2011, as one of a number of initiatives 'to shift the centre of gravity of the health system from hospitals to primary health care', the Australian Government established MLs. Their remit

⁴ Prime Minister and Minister for Health media release on the establishment of the National Health and Hospitals Reform Commission, February 2008 Canberra
<[http://www.health.gov.au/internet/nhhrc/publishing.nsf/Content/AD03A7290849CE03CA25741F001482D0/\\$File/NatRefCommMediaRel.pdf](http://www.health.gov.au/internet/nhhrc/publishing.nsf/Content/AD03A7290849CE03CA25741F001482D0/$File/NatRefCommMediaRel.pdf)>

⁵ National Health and Hospitals Reform Commission *A Healthier Future For All Australians* Australian Government 2009

is to plan and fund health services in local communities in response to locally identified need and to better connect local health services for patients and providers⁶.

Running parallel to this focus on strengthening Australia's primary care sector has been a heightened level of engagement within the acute health sector with health system innovation and redesign. Over a number of years, LHNs have been embedding redesign principles into their core activities and many have now established innovation and redesign units. A number of state jurisdictions have innovation or redesign agencies which are focused on programs and initiatives that foster integrated healthcare with a focus on 'right care, right time, right place'.

Their parallel health reform journeys highlight the alignment between the goals and activities of the Australian and Canterbury health systems. For MLs, key features of the Canterbury initiative, such as its local responsiveness, the 'burning platform' of driving forces and its underpinning philosophy of delivering health reform through strengthening the acute/primary interface are particularly relevant to their own activities.

Specifically, the *HealthPathways* component of the Canterbury initiative was attractive to the MLs because:

- It was seen to offer the primary care sector a new opportunity to drive and deliver system-wide reform aimed at improving healthcare quality, integration and efficiency
- It provides an opportunity for MLs to work more closely with their local health networks and health services to influence the health system reform agenda and to engage and support GPs and other clinicians in this process
- The timing of HealthPathways' emergence coincided with the MLs timeframes for action.

One hospital clinician said:

HealthPathways represents a real shift in the traditional power balance – that never would have happened before. It has the potential to bring primary care as an equal partner in health care delivery. MLs will be able to drive health agendas rather than responding to the needs of the hospital.

3.3 *HealthPathways* in the Australian healthcare system

Despite the similar challenges facing the New Zealand and Australian healthcare systems, there are a range of structural complexities within the Australian system that impact on the transferability of *HealthPathways* from the Canterbury to the Australian context.

⁶ Australian Government *Improving primary health care for all Australians*, Commonwealth of Australia 2011

Whilst Canterbury has two major sources of public health funding, essentially one entity (the Canterbury DHB) is responsible for planning, funding and delivering health, community and aged care across all sectors to its population of around 500,000 people. In this context, the DHB has been able to create a 'one system, one budget' environment in which it has some authority to flexibly direct funds to priority areas identified across the region. This includes negotiating with providers to encourage redirection of funding from areas within the system that the DHB identifies as offering low-value to areas that it identifies as higher-value areas of the system⁷. The rhetoric and belief that accompany the 'one system, one budget' mantra has been key to getting clinicians to think and act differently when it comes to improving and integrating services to patients across the whole system. In Canterbury this has been a key enabler of system change.

By contrast, Australian health program funding flows from countless sources, is administered by myriad organisations and is frequently linked to specific activities or outcomes, with minimal flexibility for redirection to other program areas. As health funding comes from both State and Commonwealth treasuries, there is no one entity that has overarching authority to redirect funds from 'low-value' to 'high-value' areas across the entire system and consensus regarding low and high value areas is not a given. In this environment, achieving a 'one system, one budget' approach to system change is much more challenging than it is in the New Zealand system.

All three tiers of Australia's system of government have a remit to provide health services. Their areas of responsibility interact, intersect and overlap – not always consistently and neatly. For example in metropolitan Melbourne, the catchment of Inner North West Melbourne ML (governed by the Commonwealth) overlaps with at least two LHNs (governed by the State of Victoria). In turn, these health services have overlapping boundaries with one or more other MLs. Each of these Medicare Locals' membership includes several local government areas that also have responsibilities for delivery of some health and social care services.

Aged, family, community and disability care are the responsibility of the Australian Government Department of Social Services while health care is the Department of Health's responsibility. Most state jurisdictions have corresponding portfolio separation. The Australian Government Department of Health is the primary funder of general practice through Medicare whilst hospital funding is the responsibility of state governments.

Australia has a higher proportion of people covered by private health insurance (around 50% of the Australian population⁸ compared with around 30% of the New Zealand population⁹) and an increasing proportion of care (including complex care) is provided within Australia's private system, particularly in rural areas, where some health services are exclusively provided by the private sector. Many of Australia's major metropolitan tertiary and specialist health networks provide state-wide services which

⁷ Presentation by Caroline Gullery INWMML *HealthPathways* seminar October 2013

⁸ ABS <http://www.abs.gov.au/ausstats/abs@.nsf/mf/4815.0.55.001>

⁹ Timmins N, Ham C *The quest for integrated health and social care: A case study in Canterbury New Zealand* The Kings Fund London 2013

may also include provision of services to adjoining states. Where New Zealand has one no fault accident compensation scheme, Australia has a range of state-based motor and work accident compensation schemes. Australian GPs have access to a greater range of imaging services than New Zealand GPs.

It is well documented that it is in moving between jurisdictions and sectors that patients are most likely to 'fall through the gaps' in the Australian healthcare system. In its 2013 policy review of handover of clinical care between Australian's primary and acute care sectors, the Australian national lead clinicians' group reported: 'The transition of care between different sectors of the health system is a key point in the delivery of health care where adverse events and disruptions in the continuity of care can occur'¹⁰.

Introducing *HealthPathways* to the existing health redesign agenda may serve to enhance integration, particularly between the acute and primary care sectors. However, the MLs and LHNs themselves are aware that they are operating in a far more complex environment than exists in Canterbury and are being cautious about generating expectations in Australia based on the improvements experienced in Canterbury.

They are also adapting the way they implement *HealthPathways* to fit the Australian context. For example, three Melbourne MLs with shared LHNs are working collaboratively in the development of their *HealthPathways*' programs. Through working together, these three MLs are creating a *HealthPathways*' sub-system that will cover hundreds of general practices, four or more LHNs and a population of over one million people (equivalent to twice the population of Canterbury and about 25% of New Zealand's total population). How they navigate these uncharted waters will be a source of interest and learning not just for others wanting to implement *HealthPathways*, but for cross-sector collaboration and system reform more broadly.

3.4 What is *HealthPathways*?

Australian *HealthPathways*' users describe the program as a whole-of-system, GP-focused initiative to facilitate consistency of clinical practice across conditions, regions and health sectors. They describe it as 'a means of codifying agreed practice', a 'tool to work together on shared problems' and a 'catalyst for shared conversations'. One ML manager described *HealthPathways* as: 'the glue that holds redesign work together'.

Streamliners describes *HealthPathways* as both a process and an outcome. The process involves primary and secondary clinicians meeting as workgroups to discuss and agree standardised and improved models of care at the primary-secondary interface. The outcome is a website targeted at

¹⁰ Russell, L et al *Patient safety – handover of care between primary and acute care Policy review and analysis* National Lead Clinicians' Group March 2013

general practice teams that provides quick and clear information about the models and pathways of care arising from the *HealthPathways* process¹¹.

Selection and development of the site's content is prioritised according to locally identified needs. Pathways are agreed by local clinicians based on the services available in each region and informed by existing evidence, guidelines and protocols.

The content of the *HealthPathways* websites includes:

- Clinical pathways – summarised guidance on the assessment and management of a presenting condition in general practice including:
 - Information that enables the GP to determine how much of the patients management can be undertaken in the community
 - Which patients/conditions need to be referred for specialist management
 - Tests and treatments the GP should have tried or completed before referring to the hospital specialist
- Resource pages – additional reference material relating to the clinical pathway and specialty services
- Referral pages – thresholds for access to a range of community and hospital specialist services, referral requirements, and contact details
- Patient information pages – information created during the clinical pathway development process that can be printed (by the general practice team) and given to the patient.

To date, over 550 pathways and accompanying support pages have been developed in Canterbury and more than 200 pathways have been 'localised' by Australian MLs.

Localised pathways are pathways that have either been developed from scratch by working groups of local clinicians or modified by local clinicians from pathways developed in other regions. In addition to the more generic clinical information they contain referral and resource pages with information on locally available services.

Non-localised pathways are those that have been developed in one region and are being used in another. Whilst their referral pathways and contacts are not all relevant to regions other than the one in which they were developed, they contain evidence-based clinical information and guidance which is relevant to all regions. Because many of the specialist clinical colleges are common to Australia and New Zealand, clinical content of the pathways developed in Canterbury is generally transferable to Australian clinical practice.

All of the pathways that have been developed to date are made available to new members when they join the *HealthPathways* community and are clearly marked so that clinicians can easily identify that

¹¹ *Information, Training and Resource handbook for health organisations implementing the Whole-of-System approach and HealthPathways Streamliners* New Zealand 2013

they are not localised pathways. Sharing of the pathways between regions has been an enabler of efficient implementation of the program as each region has not had to develop every pathway from scratch. Appendix six is a sample page from the Canterbury *HealthPathways* website and appendix seven is an example of a flow chart which illustrates how the clinical information from the non-localised pathways can be useful to clinicians.

At this stage the *HealthPathways* website itself has not been designed for patient access – the sites are password protected and targeted at clinicians within participating regions only (other websites have been developed for patients as part of the Canterbury initiative). *HealthPathways* is not structured decision support and there is no integration between the *HealthPathways* website and individual patient data. It is not designed to be a substitute for practitioners' clinical knowledge base, but rather to provide guidance, support and standardisation of care and to improve the flow of care between different clinicians within and across sectors of the health system.

Some of the key differentiating features of the *HealthPathways* initiatives compared with other “pathway” projects are:

- Consistency of pathways is maintained within and across regions by independent technical writers so that pathways developed in one region can be easily used by clinicians in other regions
- The pathways are agreed by working groups of primary and secondary care clinicians in response to locally identified needs and documenting locally available services
- The pathways are primarily targeted at and developed by primary care clinicians.

3.5 Streamliners

Streamliners is a private, New Zealand-based technical communications company that has supported the development of the *HealthPathways* web-based platform and content in Canterbury. Whilst the Canterbury DHB has developed much of the *HealthPathways* clinical content, Streamliners has developed the *HealthPathways* platform and the associated methods, processes, software and services for editing and structuring the clinical content, sharing content between participating organisations, publishing it, and keeping it up-to-date.

Under an agreement with the Canterbury DHB, Streamliners has the right to use, share and modify content that is based on the content originally developed by Canterbury DHB. Streamliners has entered into contracts with fourteen MLs (and or their LHNs). Under these contracts Streamliners provides:

- A customised *HealthPathways* website, populated with localised pathways and with all of the Canterbury pathways (clearly marked as ‘non-localised’) for clinicians
- A project management website for the *HealthPathways* teams which enables access to all of the pathways and other resources developed across the *HealthPathways* program

- Technical writing services (content development and editing) to ensure content is consistently structured and styled for ease of use and understanding,
- Tools, processes, and services for managing user feedback and pathway reviews,
- Reporting to each region's *HealthPathways* team
- Training and advice to the *HealthPathways* team
- Operation of the *HealthPathways* Community including organising annual conferences, convening support groups for clinical editors and coordinators and hosting project management sites

The fees paid by MLs to Streamliners include one-off start-up fees and annual recurring fees. The one-off joining fee includes a fee, calculated per head of population that is paid to Canterbury DHB for access to its intellectual property. For a region with a population of around 200,000 people, this licence fee would be around \$80,000. Added to this are Streamliners fees to cover the services listed above. Annual recurring fees are likely to be less than the establishment fee, depending upon the hours of project management and technical writing required.

Prior to entering into contracts with organisations, Streamliners assess the readiness of organisations to participate in the *HealthPathways* process. Streamliners' experience is that organisations must have certain pre-requisites in place to successfully implement the whole-of-system approach that includes *HealthPathways*. These include:

- A clear vision for the future
- State and Commonwealth partnership
- Committed leadership
- Data literacy & tools to evaluate performance and make system flow decisions
- Key stakeholders who are willing to embrace change without fear of loss of domain
- Engaged and empowered clinicians¹².

Whilst the overall program development approach is relatively consistent from region to region, specifics of pathway development vary depending on personnel involved, resources available and local issues and priorities. The Streamliners' technical writing team work to maintain standardisation of the pathways within each region and across the entire program. The consistency of the language, look and feel of the pathways across all programs is an important element of the program's usability.

Streamliners also works with the project teams in each region to amend pathways as those teams:

- Audit the effects of service changes and fine tune the pathways
- Review and manage feedback submitted by users via the feedback button
- Review referrals to service providers and engage with referrers not following the pathways
- Formally review pathways on a biennial schedule.

¹² Streamliners *HealthPathways: For a connected health system* Information, Training and Resource handbook for health organisations implementing the Whole-of-System approach and HealthPathways

4 Mapping the *HealthPathways* implementation process

4.1 Drivers and governance

Each region identified one or more significant drivers for initiation of their *HealthPathways* program. For LHNs, a common driver was excessive demand for ambulatory care leading to long waiting times for appointments – in more than one region there was awareness that if there was no change to the way things were working, some patients would never get an outpatient appointment.

MLs' needs' assessments had identified fragmentation and complexity at the acute primary care interface as well as access blockages that were impacting on GPs' attempts to refer patients into the acute system. Some felt that the primary care system had greater capacity to reduce pressure on the health system overall. For most, timing was a critical factor, with *HealthPathways* emerging at a time when LHNs and MLs had started conversations about working together to address some of their shared challenges. One *HealthPathways* coordinator said:

It wrapped a system approach around the conversations we had been having.

Program funding has been contributed by MLs and/or LHNs with either one taking the lead in the contractual arrangements with Streamliners. In all five participating ML regions there is formal or informal agreement between the ML and their LHN including formal contracts, memoranda of understanding, charters or letters of agreement.

Each region has established a *HealthPathways*' governance structure which may include steering committees (with ML and LHN members), research and evaluation committees, technology and eHealth committees and program working groups. To address redesign opportunities arising through the *HealthPathways* program the Barwon region has created the 'analysis of service issues and opportunities' committee (known as ASIO). See appendix three.

An important part of the program structures are the core *HealthPathways* teams which include:

- Management staff (usually with *HealthPathways* as one of a number of portfolio areas)
- A *HealthPathways* coordinator
- Project staff
- Clinical editors
- Facilitators
- GPs, GP liaison officers and hospital specialists.

Team members are employed by the ML, LHN or work in general practice – some *HealthPathways* team members work in two or more of these areas. Other than the co-ordinators, most team members are part time.

Once organisations are assessed as ready and the contractual, governance and staffing arrangements are underway, the pathway development work can begin. All ML/LHN partners began by mapping a few key pathways in the first instance. The areas of focus vary from region to region based on local need. In the Melbourne region, the first two priority areas identified were diabetes and Hepatitis B. Townsville is initially focusing on ENT, cardiology and cellulitis.

4.2 Working groups

Working groups are a forum for bringing clinicians together who share common care of particular patient cohorts and who may not normally work side by side (often hospital specialists and GPs). Membership varies and may include subject matter experts (clinicians with specialised knowledge of a particular area), clinical editors, members of the *HealthPathways* team and a facilitator. Working group members are chosen taking into account their level of clinical expertise in the relevant areas, their level of influence and standing amongst their peers and their enthusiasm for the process.

In some cases, working groups have been established to develop or localise specific clinical pathways for a process or particular condition e.g. immunisation or uncomplicated pregnancy. In other situations working groups have been established to discuss issues relating to broad clinical streams and from this discussion, pathway development might follow. Sometimes *HealthPathways* teams opt for rapid localisation of Canterbury pathways to address locally identified needs. Getting hospital specialists and GPs collaborating on pathway development is one benefit of the *HealthPathways* program that was mentioned repeatedly throughout the evaluation.

Advice from *HealthPathways* teams is to keep the sign-off process as simple as possible. One stakeholder said:

As long as the clinical care outlined in the pathway is fundamentally safe, the detail can always be changed after it is launched based on user feedback. As long as it's not wrong, it doesn't have to be perfect.

HealthPathways teams stress the importance of appropriately remunerating working group participants for their time. Also consider including professional development points as another incentive for clinicians to be involved. Group membership should be diverse. Meetings should be well prepared and the next meeting not take place until all of the actions from the last meeting are completed.

Once the key issues and approaches are identified, pathway development work is often done by the *HealthPathways* teams with contributions from the working group members, clinical editors, subject matter experts and other clinicians. Initial drafts are circulated to key people such as allied health professionals, other specialists and GPs for feedback and comment prior to 'sign-off' and launch. The Streamliners technical writing team ensures pathways are standardised across all programs before they are launched.

4.3 Local clinical editors & coordinators

Each region engages its own local clinical editors and coordinators to drive their *HealthPathways*' developments and localisations. The clinical editors are always GPs as *HealthPathways* is written for general practice teams and GPs are well placed to understand the information their colleagues will find most useful. They aim to keep the pathways brief and not to include information general practice teams do not need or already know. They ensure that their local *HealthPathways* remains a combination of a day-to-day process manual, collaborative best practice guidance, and locally available resources.

The clinical editors work with a local *HealthPathways* coordinator who monitors and triages user feedback, obtains local service information, and follows through on a range of tasks to support and assist the editors. The editors and coordinators work closely with the technical writing and publishing team at Streamliners.

4.4 Pathway review

Pathways are reviewed regularly in response to user feedback which can be submitted using the feedback button on each page. They are also routinely reviewed after the first twelve months then biennially after that. The local clinical editors consider all feedback, perform all scheduled reviews, and instruct Streamliners about the required changes. Turn-around times for Streamliners to update the pathways based on user feedback are rapid, particularly if a user identifies any risk associated with the information contained in the pathway. When a change is made to one pathway, it may necessitate changes to related pathways e.g. if the stroke pathway is changed, the Transient Ischemic Attack (TIA) pathway may also need to be changed.

4.5 Associated initiatives and activities

Sitting alongside the pathways are a range of associated initiatives and redesign activities. This broader redesign work is the second tier of the *HealthPathways* program and is essential if *HealthPathways* is to influence system reform. Having an impact on the broader redesign agenda can be a greater challenge than the development of the pathways themselves as this work is most often outside the remit of the *HealthPathways* development teams. One interviewee commented:

The pathway development itself isn't a walk in the park but it's the bigger service redesign that is creating the challenge. A whole lot of stuff falls out from each pathway like identifying issues which stop the pathway from working.

As an example, it is important to ensure there is consistency between documented pathway processes and actual practice. If a referring GP has followed the steps in the pathway, completed the appropriate



5 Current status of *HealthPathways* programs

Each of the five participating ML/LHN partnerships is at a different stage of their *HealthPathways*' program implementation. All have finalised contractual arrangements with Streamliners and established governance structures. Appointment of staff is underway.

At the time of writing, Townsville Mackay ML was preparing to convene its first working groups in preparation for commencing work on a pathway for cellulitis. It aims to launch its *HealthPathways* website in February, 2014 with its first 10 locally developed pathways and the non-localised Canterbury DHB pathways.

The Inner North West Melbourne ML, working in partnership with Inner East Melbourne ML has established its first clinical working groups in diabetes and hepatology. They have identified a number of other areas of focus and are aiming to launch in March 2014 with 20 locally developed pathways.

Central Coast NSW ML launched in late September 2013 with around 42 pathways. Their website now hosts 67 localised pathways.

Barwon ML launched in early August 2013 with 20 localised pathways. Their website now hosts 30 live clinical pathways and 20 resource or referral pages. They are now working on 14 new clinical pathways and eight to 10 resource and referral pages

Hunter ML has the longest running of the five programs and was the first to launch the *HealthPathways* program in Australia, in April 2012. It currently has over 230 localised pathways and had completed 38 annual pathway reviews by October 2013.

5.1 Patterns of use

Website analytics were available for Barwon and Hunter as these are the most mature of the five programs. Table 1 compares usage figures in these two regions with the Canterbury usage figures. Appendix four contains graphs of the daily page views for each of the three regions since launch/recording commencement.

In the Hunter region, where the program has been live for almost two years, visits to the site are steadily growing, currently averaging around 1,000 page views per day. The Barwon page views have been relatively steady since its launch in August 2013. This trend may change when it is charted over a longer period of time.

Table 1 - *HealthPathways* usage figures from three regions

Region	Barwon	Hunter	Canterbury
Launch date	August 2013	April 2012	August 2010 (started recording)
Visits - since launch	2,307	32,757	466,412
Page views - since launch	13,905	270,023	2,972,258
Average page views per day since launch/recording commencement	99	431	2,468
Page views trend graph (see graphs in appendix 4)	Steady since launch	Climbing since launch	Climbing since launch

Appendix five shows the most commonly viewed pathways by users in Barwon, Hunter and Canterbury regions since launch. This data highlights the regional variation in the information clinicians are accessing. Both Hunter and Barwon MLs have prioritised their localisation efforts towards those conditions most referenced by general practice teams in their area. In Barwon, the top twenty pathways have a strong orthopaedic and paediatric focus while in Hunter the most commonly viewed pathways have a more diverse focus covering chronic disease, mental health, maternity care, geriatric medicine and acute care.

5.1.1 Localised and non-localised pathway use

Whilst users find the clinical information in the Canterbury pathways useful (see chart two, appendix two), the localised pathways are visited more frequently than non-localised pathways. Nineteen of 48 survey respondents reported that they use localised pathways one to ten times per week whilst only nine respondents use non-localised pathways one to ten times per week (see chart one in appendix two).

An analysis of the statistics for the Hunter site for a three month period from September to November 2013 shows that 74% of page visits are to localised pages. In the Barwon region all of the top 20 most commonly viewed pathways are localised and in Hunter, 18 of the top 20 are localised (see appendix

five). Investing resources in getting pathways localised quickly was noted as a key enabler of the program's successful implementation.

6 Impacts

6.1 Measuring impacts

Measuring the impacts of *HealthPathways* independently of associated initiatives is a challenge facing all agencies evaluating the program. As the Kings Fund authors found in their case study of the Canterbury Initiative, 'amid the welter of initiatives that Canterbury has undertaken, it is impossible to unpack their individual impact'¹³. This observation is equally relevant in the Australian context as illustrated by this comment from one hospital executive:

The end process does rely on the other redesign projects. You're never going to be able to unpick the HealthPathways component and directly attribute impacts to that. It's a global approach – with all of the elements being interdependent. It's not safe to remove one element of the system without risking the whole thing falling over.

ML staff expressed broad aims for their *HealthPathways* programs including 'streamlining services for patients', 'providing a seamless service to end users' or 'reducing outpatient blockages'. However, there were no specific outcome measures against which achievement of these aims can be gauged. In recognition of this, *HealthPathways* teams are now establishing processes that will enable them to define outcome measures and collect data to help demonstrate program impact. This data was not available to inform this evaluation.

In addition to overarching, program aims, each individual pathway will have its own set of outcome objectives. At this stage however, this pathway-by-pathway impact data is also unavailable. In reference to this, one *HealthPathways* team member said:

We talked in the beginning about getting each pathway group to define the thing that their pathway was going to change to get a baseline [measure]. For us that hasn't eventuated yet. We've said to the others, pay attention to that, if you think you're going to change the waiting time, referral quality, admissions - state that up front and then measure it to see if you really have influenced it. Patient health outcomes are still a long way down the track so at this stage we need to pick proxies to measure outcomes.

Other evaluations currently either underway or in the commissioning stage are aiming to measure the impacts of *HealthPathways* over the longer term. Tasmania ML is commissioning a formative and summative evaluation that will run alongside implementation of its *HealthPathways* program. In

¹³ Timmins N, Ham C *The quest for integrated health and social care: A case study in Canterbury New Zealand* The Kings Fund London 2013

addition to evaluation of the development and implementation of the program, the Tasmanian evaluation will be focusing on the pathways themselves – selecting a sample of pathways and collecting data on indicators of success pre and post pathway implementation.

The NSW Agency for Clinical Innovation (ACI) has been working with the Hunter ML to undertake a three stage retrospective evaluation of implementation of its *HealthPathways* program. The stage one findings will be released shortly and the evaluation is currently moving into its second stage. Whilst the full findings were not available to inform this report, some of the early indicators are that the success of the *HealthPathways* program is linked with:

- The strength of relationships between MLs and LHN
- Clinician led pathway development teams
- Clearly articulated core principles
- Support from senior ML and LHN managers.

The ACI is also supporting *HealthPathways* evaluations in Sydney, Western Sydney and Central Coast NSW.

6.2 Impacts to date

Stakeholder interviews indicated that early impacts of the *HealthPathways* program are likely to result from the pathway development processes, the way clinicians use the resource and the capacity of health services to address gaps and issues highlighted through its development and use.

To measure some of the program's early impacts this evaluation adopted a subjective, whole-of-program approach using an electronic survey. Appendix two outlines the distribution methods, response rates and details of the survey findings. Due to the variation in stages of implementation across the five regions and the relatively small numbers of respondents, caution must be used when drawing broad conclusions from the survey data.

6.2.1 System performance

Survey participants were asked to rate their observations of change in a number of areas that correlated with the stated aims of the program such as reducing outpatient blockages, streamlining patient services, providing a seamless service to end users, improving clinician job satisfaction and reducing workload.

Consistent with the interview findings, the survey data revealed no evidence of an observable impact on system performance indicators such as waiting times for hospital services or numbers of patients discharged from hospital ambulatory care clinics to primary care services. The exception to this was that in two regions there were anecdotal reports of reduced waiting times for maternity services since

the implementation of maternity pathways. It should be noted though that this occurred in conjunction with other redesign activities.

6.2.2 Collaboration

Improving collaboration between acute and primary care sector clinicians – particularly medical clinicians - is possibly the most significant observed impact of the *HealthPathways* program to date. Respondents rated the *HealthPathways* program highly effective in:

- Involving GPs in identifying and prioritising health system issues (54% highly effective and 33% somewhat effective)
- Bringing hospital specialists and GPs together to discuss health system issues (41% highly effective and 46% somewhat effective).

It was considered somewhat effective by respondents in:

- Involving hospital specialists in identifying and prioritising health system issues (54% somewhat effective)
- Addressing the health system issues identified and prioritised by GPs and medical specialists (51% somewhat effective)
- Bringing medical and allied health professionals together to discuss health system issues (43% somewhat effective)

In the Australian healthcare system, clinicians from different sectors can be seeing the same patient cohorts for many years without ever meeting each other. Their main source of contact is through referral and discharge correspondence of variable quality. This has led to a disconnect between clinicians from different sectors that can influence their understanding of and attitudes towards each other. Ultimately this impacts on the functioning of the system as a whole.

One LHN manager said:

We had a paternalistic culture when it came to our patients. The orthopods thought they were responsible for the orthopaedic care of [the entire region]. They realised they can't do it any longer but were uncertain about what primary care could do. At the same time we had primary care physicians saying, "Why aren't you sending these patients back to us?" Specialists felt their care was going to be compromised if the hospital didn't do it. As a result, two thirds to three quarters of patients were reviews and there were long waits for new patients to get in.

HealthPathways has created a forum for these clinicians to sit down together and voice the challenges they each face in providing care to their patients. It also gives clinicians a chance to have a say in how finite resources are used.

6.2.3 Clinician experience

Respondents reported some changes in their personal experience of patient care since using *HealthPathways*. As shown in chart eight (appendix two), for the specialty areas in which one or more *HealthPathways* have been localised in their regions, respondents have personally experienced the following:

- Improved confidence in managing patients with conditions for which there is a pathway (76%)
- Improved knowledge of local services for their patients (70%)
- Improved understanding of the roles of other health professionals in managing conditions for which there is a pathway (68%)
- Evidence of an improved understanding of their own role by others in managing conditions for which there is a pathway (49%).

And whilst there has been no significant change in workload, 12 respondents indicated an increase in job satisfaction (33%). The process gives GPs more support to manage patients, for whom it is appropriate, in the community rather than referring them to a specialist as a default action.

There's an awful lot of fear that the legal profession will look you down but if you've got a pathway there to support you, it gives you more confidence to not just refer to the hospital outpatient clinic as a default action. It provides GPs with the confidence that they are doing the right thing to not send them to the specialist first.

If patients who might once have been referred to a specialist are now being managed competently in general practice by a well supported GP, specialist capacity becomes available to see patients who really need specialist care. One interviewee explained:

Only about five percent of patients referred to neurosurgery for back pain ever end up getting surgery – most just need physio or pain management – the specialists loathe those clinics because they have to tell patients there's nothing they can do for them and that they've waited two years to be told that. There will be a lot more community management of patients with guidelines.

6.2.4 Support for GPs

General practice is a common entry point into the health system for patients with every type of health condition. GPs acknowledge the difficulty of accessing current, evidence-based management guidelines for every possible health condition. This most likely accounts for why the clinical pathways themselves, that is, the pages that contain the information and guidance on management of specific clinical conditions were rated as the most valuable *HealthPathways* resources to clinicians (see chart five, appendix two).

Respondents thought *HealthPathways* would be particularly beneficial in supporting junior/registrar GPs and GPs who are new to a region. However the majority indicated that it would also be highly beneficial in supporting practice for experienced GPs who are:

- Seeing a patient with a condition they haven't seen for a while
- Wanting to keep up to date with current best practice
- Wanting to provide care in accordance with locally agreed guidelines (see chart 10, appendix two).

One GP said:

My main hope is that it will be an information repository that supports GPs and gives us a lot more information about what's available. GPs are under a huge amount of pressure to make sure we've got the best evidence-based guidelines and my impression is that most GPs put a lot of work into keeping up to date. Just having a one-stop shop that is kept up-to-date, including the services that are available locally, would be really helpful.

Some of the general survey comments also highlighted how beneficial GPs find the program.

Comments included:

Please keep it, it has made my life sooooo much better!!

Keep it going!

I think localised pathways are very useful and love using them.

7 Risks and benefits

7.1 Potential benefits

Current *HealthPathways*' users envisage that it will lead to a range of benefits that are yet to be realised. The primary beneficiaries are predicted to be patients and their GPs but ultimately the benefits should flow through to the broader system through:

- Improved communication and relationships between GPs, specialists, hospitals and allied health professionals
- More efficient use of local resources, resulting in improved patient access to appropriate services and information
- Fewer unnecessary referrals to outpatient clinics and fewer patients undergoing unnecessary investigations
- Improved transfer of care between settings

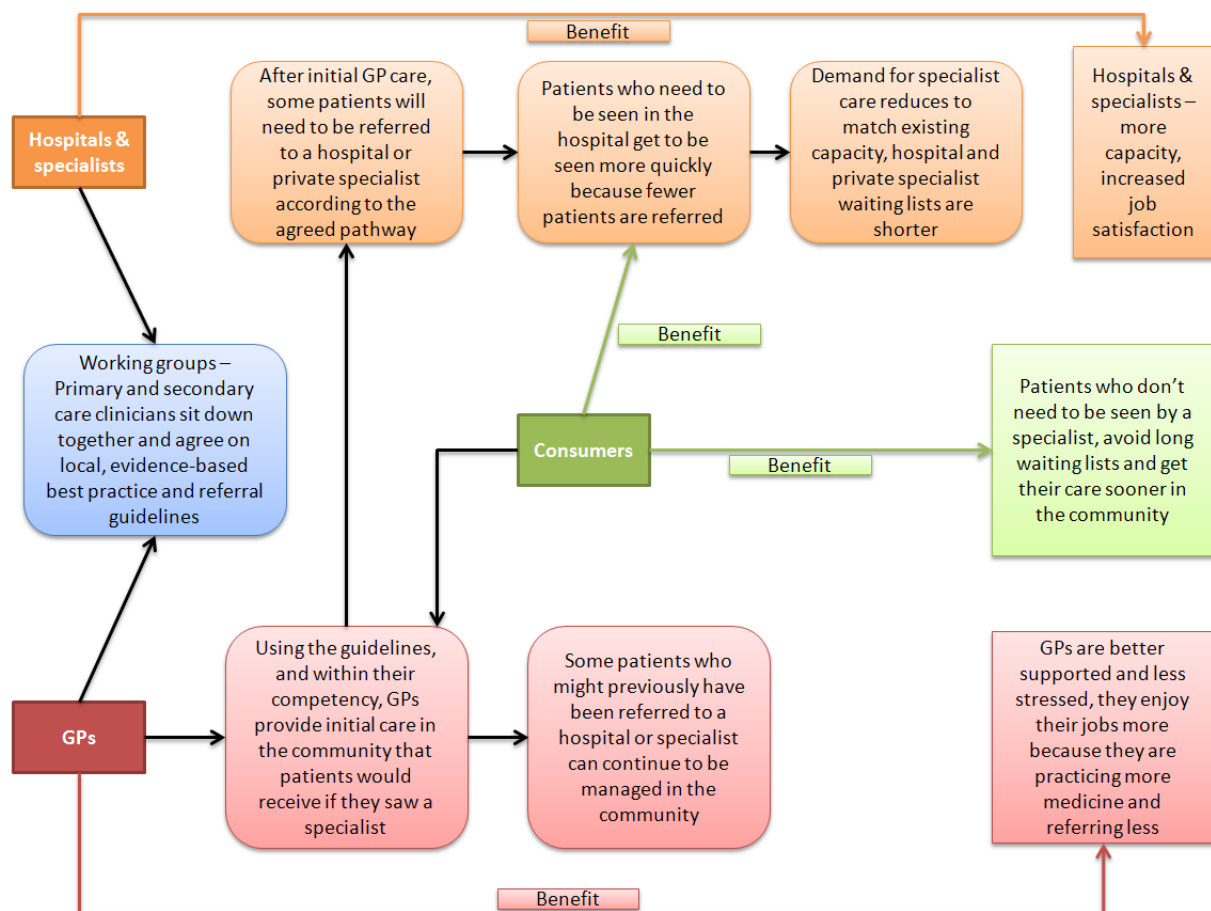
- Improved consistency and coordination of practice across a region which more closely approaches best practice.

One *HealthPathways* team member gives an example of how this might work:

Parents with a child with particular issues may be going to a GP for a referral. HealthPathways provides a way the GP can engage with the client rather than just refer them on. The parents know that the GPs and paediatric specialists have sat down together and worked out the management options – the GP can immediately start implementing these and the parents can be confident that the care they are getting is consistent with the care they would be getting from the specialists but in a much more timely manner – eventually, if it's needed, they will still get to see a specialist – but it may not even be needed.

Figure 2 shows a simplified representation of how benefits may flow to consumers, GPs, specialists and hospitals.

Figure 2 - Potential benefits of the *HealthPathways* program.



The patient cohort for whom *HealthPathways* was rated most 'highly valuable' was patients with chronic medical conditions such as diabetes, heart disease and arthritis (see chart four, appendix two). For patients with multiple co-morbidities however, using *HealthPathways* is more complex as the clinician may need to reference different pathways for different aspects of their patient's care. Whilst there are pathways that address specific co-morbidities such as pregnancy and diabetes or pregnancy and thyroid disease, there is no overall complex multi-morbidity pathway.

One interviewee said:

Complex and chronic conditions and multiple co-morbidities represent huge challenges because you have to use multiple pathways. Using multiple pathways can lead to technical difficulties. Often one pathway will not cover what you need. It is a risk that GP time is so limited.

A number of interviewees observed that GPs are already used to seeing patients with complex needs and co-morbidities and that this can be a constant challenge with or without *HealthPathways*. Some felt that the *HealthPathways* program may provide opportunities to review the way our system currently manages people with complex health issues, exposing gaps, and redesign opportunities as well as focusing attention on areas of excellence in current management.

As one clinician said:

HealthPathways might be the forum for discussion of how to fix it rather than the solution.

As more pathways are developed, the focus on chronic disease and multiple co-morbidities may increase. Another clinician said:

HealthPathways can't address chronic disease on its own but an alliance that has HealthPathways in it has more chance.

Another potential benefit of the program may be through enhanced multidisciplinary care. Whilst some participants felt that working groups were fairly doctor to doctor focused, the working group process provides the opportunity to involve a broader mix of professionals including nursing and allied health professionals, depending upon what is the most appropriate professional mix. One *HealthPathways* team member said:

It starts out to be very GP to specialist discussion. They then look for other evidence-based treatment options by other professionals. Once the pathway is in draft we have a private allied health advisory group. This includes osteopaths, physios, chiropractors. [There are] lots of competing interests but so far so good.

The *HealthPathways* process creates opportunities to examine current practice in a particular area and to challenge the way things have been done if people see that things can be done differently:

I think it has the potential to clarify roles and make clear that sometimes there is porousness between roles – there is not just one person who can do this. [Who can do it] may depend on geographical setting or cultural. [It] gets people in the room together and makes them think we don't need to own all of this.

7.2 Potential risks

Although *HealthPathways* is intended to improve practice and lower clinical risk, several stakeholders expressed concern about the potential for increased clinical risk if it leads a clinician to practice beyond the boundaries of their clinical competency. The pathways are not intended to be a prescription for care but rather provide information to support the clinician's judgement. One pathways team member said:

Pathways are designed to get GPs to go a little further than they might otherwise have before referring them on. If an area is outside their clinical expertise [the risk is] they might take on a bit more than they might otherwise have if they had referred them on straight away.

Although this was identified as a potential risk, there was no mention by evaluation participants that this practice had been observed to date. Clinical risk management and quality assurance is embedded in *HealthPathways* program governance.

8 Sustainability

Most participants were positive about the program's sustainability over the next three to five years (see chart 12, appendix two) however the evaluation identified a number of factors that have the potential to impact on this.

8.1 Clinician engagement

Clinician engagement with *HealthPathways* is multi-faceted and includes:

- Engaging appropriately experienced and skilled clinicians on an ongoing basis to contribute to pathway development
- Raising awareness and encouraging use of the pathways as a primary source of information by GPs and other clinicians so that their use becomes embedded in clinical practice
- Investing in delivering the system reforms that accompany pathway implementation required to achieve system-wide transformation.

Specialist clinicians working in hospitals are viewed as being particularly 'time poor with heavy patient workloads' and therefore limited in their availability to contribute to pathway development. GPs can be

a difficult practitioner cohort to engage in new programs and once engaged they must have positive experiences of the program if they are to remain engaged. The *HealthPathways* teams are aware that if clinicians become disengaged with the initiative, it will be harder to re-engage them than it was to engage them in the first place.

Beginning long before the site is launched, the *HealthPathways* team members are working with GPs and specialists across their regions to make clinicians aware of the program and to encourage their involvement. Getting a critical mass of localised pathways developed quickly and making sure these are kept up to date will help address the risk of potential GP loss of engagement.

Managing stakeholder expectations is another challenge in maintaining clinician engagement. Growing awareness of the potential benefits of *HealthPathways* has generated a great enthusiasm amongst clinicians and managers and some have come to see *HealthPathways* as a cure-all for the system issues with their service. Continuing to support clinicians in understanding that *HealthPathways* is part of a broader system redesign effort and not a solution in itself will help ensure ongoing engagement with the program as clinicians work through the process of system reform.

8.2 Maintaining resourcing

In addition to the significant up-front costs of establishing *HealthPathways*, ongoing resourcing is required for Streamliners' services and to fund *HealthPathways* staff in MLs and LHNs. It is widely accepted that significant, system-wide *HealthPathways* impacts will not be seen in the short term. It is therefore critical that long term resourcing of the program is assured if potential benefits are to be realised. A number of participants were of the view that not all *HealthPathways* teams have the resources needed to get the program established in a timely manner. MLs and LHNs may need to explore additional resourcing options to ensure the program's current momentum is sustained.

There is an enormous amount of goodwill associated with the *HealthPathways* program, particularly from those most closely involved in its development. There is strong belief in the program's worth and its transformative potential. This belief appears to be a significant driver of people's enthusiasm and engagement with the program and in some regions it translates into staff working on the program for more hours than are funded. Whilst this is one of its strength it may also represent a risk. Goodwill is not a substitute for solid resourcing and this is a resource hungry program. One *HealthPathways* team member commented:

It's going to need ongoing review – it will cost and someone has to be prepared to pay. [There are] half a dozen staff in the Medicare Local working on it currently - that will be a need for 12 to 18 months and then the program will need ongoing review. If it doesn't stay current and accurate, GPs will stop using it.

8.3 Data collection

Without high quality data to demonstrate its impacts, it is likely to prove challenging for MLs to successfully advocate for ongoing funding to continue its implementation. Whilst users are able to identify a number of potential benefits, it will be important that data collection mechanisms are developed to enable these to be demonstrated empirically. Whilst some data collection and evaluation tools will be transferable across regions, much of the data will need to be collected locally as it will be unique to individual pathways. As previously discussed, one of the program's biggest challenges will be attributing any system improvements to *HealthPathways* in isolation of interconnected activities.

The NSW ACI and the Tasmanian ML have developed long term evaluation frameworks to support high quality data collection aimed at demonstrating program impacts. It is likely that these evaluation frameworks and ongoing evaluation information will be shared through the *HealthPathways* community website. This may benefit other MLs in their data collection and evaluation efforts.

8.4 Maintaining collaboration

Strong, ongoing collaboration between the ML and the LHN is also critical to the program's sustainability. Competing priorities have been observed by some participants to compromise the LHNs' capacity to maintain engagement in collaborative work with the ML. This may compromise the program's capacity to have a meaningful impact.

One ML executive said:

Most of the blockages are within the health service and we have little influence in redesigning outpatient and ward flow processes. We're trying to work from the CEO down but it's slow – it's a change management process. We can hopefully help them with the number of people who present to ED but we're not adding a lot of value necessarily in the areas they are being measured on like elective surgery wait times, and ED wait times.

Another commented:

[Sustainability] will depend on the ability of the LHN to provide staff to work on HealthPathways. It has been difficult to get the people from the LHN to put the time into working on them. At the moment the LHN is super busy and at capacity patient-wise. And with the current capacity of the ML to do HealthPathways - it would probably take quite a while for it to get enough pathways localised for it to be useful.

8.5 Policy level engagement

There is already some engagement with the *HealthPathways* program at the government level although this varies between jurisdictions. The NSW government, through the ACI is assisting with *HealthPathways* evaluations in four NSW regions. The Commonwealth Government is providing funding assistance for the Tasmanian *HealthPathways* program and its evaluation.

Stronger engagement between the *HealthPathways* program at ML/LHN level and state and federal governments is likely to enhance its prospects for sustainability. Engagement may centre around:

- Specific initiatives such as GP hot lines or virtual first assessments to support *HealthPathways* use
- Proposals highlighting 'missing aspects of care' identified through the *HealthPathways*
- Linking with e-referral and e-health initiatives such as the PCEHR and the national service directory
- Linking with policy activities such as ambulatory care policy or funding reviews.

Supporting stronger engagement between MLs and governments around *HealthPathways* may be an area in which AML Alliance could play a role.

One interviewee said:

At a certain level, HealthPathways is no different to a hundred other initiatives we've tried over the years. I don't believe it will reach its potential until we have electronic referrals, automated processes and decision support processes up and running.

Another said:

GPs need more support than just a website and a knock back from the hospital. [They] also need GP hot lines or virtual first assessments to give them more immediate support. These need to be funded to be viable.

A continued commitment to the MLs (or similar entity) will also be a critical factor in the sustainability of *HealthPathways*. At the time of writing, a review of MLs is underway and it is due to report to the Australian Government in March 2014. One interviewee said:

If you have no Medicare Locals, there's no mechanism to gather people in the room. It would be hard to achieve inter-sectoral collaboration and change without some sort of body like the Medicare Locals or divisions of GP because acute health services don't have that kind of engagement with the primary care sector

8.6 Contractual arrangements

As more MLs become interested in *HealthPathways*, it is likely that the program will expand further in Australia. Whilst the current structural and contractual arrangements between Canterbury DHB, Streamliners and the MLs have worked adequately to date, further Australian interest in the program may provide an opportunity for these arrangements to be reviewed with the aim of enhancing the program's sustainability and affordability in Australia.

Under the current contracts, whilst organisations purchase the *HealthPathways* intellectual property as part of their up-front expenditure, termination of their agreement with Streamliners would lead to loss of access to the *HealthPathways* platform and content updates. It would be difficult for organisations to sustain their *HealthPathways* programs without this and therefore ongoing sustainability is dependent on preservation of their contractual arrangements with Streamliners.

For some MLs, the up-front costs associated with gaining access to the Canterbury DHB intellectual property will be significant. As more of the *HealthPathways*' intellectual property is developed in Australia, it may be reasonable that charges to new Australian entrants are re-negotiated to reflect the growing contribution of the Australian healthcare system to the program.

To date, financial negotiation has been between individual MLs or LHNs and Streamliners (who also represent Canterbury DHB). Should a significant number of MLs be interested in joining and Canterbury DHB agreeable to admitting them to the program, this may provide an opportunity for an organisation like AML Alliance to represent the MLs in negotiating financial and structural arrangements that maximise the program's affordability and sustainability for the Australian healthcare system.

Currently, the relationships between Streamliners and the MLs appears positive and strong. Importantly, the *HealthPathways* teams like working with Streamliners and generally find them professional, reliable and responsive. The involvement of Streamliners is arguably one of the key success factors of the *HealthPathways* program in both New Zealand and Australia. One *HealthPathways* team member said:

There is no-one in Australia that we have come across that has their [Streamliners] let's get it done attitude. The barriers to IT are so great [in Australia]. NZ do it well and on a world scale they're probably quite good value [for money].

Preserving these strong and workable relationships, whilst negotiating an affordable and sustainable structure, would support a broader uptake of the *HealthPathways* program across Australia.

9 Other cross-sector collaboration initiatives

Literature reviews undertaken by the University of Queensland and Flinders University for AML Alliance's Clinical Engagement and Cross-sector Collaboration Program have identified a range of initiatives to foster improved integration and collaboration in the delivery of health care in Australia. These range from broad, statewide initiatives such as Victoria's Hospital Admission Risk (HARP) or the NSW Connecting Care program to highly local models such as Queensland's Inala Indigenous Health Service¹⁴. A number of the models they have examined share common features with *HealthPathways* such as:

- Disease specific referral guidelines and templates
- Acute/primary care liaison models
- A pooled funding model for patients with chronic conditions¹⁵

Where most of these models differ from *HealthPathways* is that they are targeted at specific patient cohorts (such as those with severe chronic disease or multiple co-morbidities) or specific jurisdictions (predominantly sub-regional, regional or state-wide).

An important feature of cross-sector collaboration highlighted by the University of Queensland's review is that there is no 'one size fits all' approach to health system integration. Innovations in cross-sector collaboration need to be tailored to local conditions¹⁶.

HealthPathways differs from other cross-sector collaboration programs in fostering health system integration by combining a national reach with local responsiveness. *HealthPathways* is currently being implemented across five Australian states and the ACT. The Australasian *HealthPathways* community fosters collaboration, standardisation, continuity and support across all of these regions and New Zealand. Balanced with this, is that the program is locally tailored and responsive. *HealthPathways* is not restricted to any particular patient cohorts or conditions.

The only other cross-sector collaboration model considered by some MLs as an alternative to *HealthPathways* was the National Health Service's Map of Medicine (MOM). Developed in the United Kingdom, the MOM supports standardised cross-sector care and provides clinical decision support through locally customisable pathways. Similar to *HealthPathways* these MOM pathways are developed through a process by which clinicians meet to discuss local best-practice. Over 1800 pathways in 300 clinical areas have been developed to date.

¹⁴ <http://www.health.qld.gov.au/ihs/>

¹⁵ Battersby M & SA HealthPlus team (2005) Health reform through co-ordinated care: SA HealthPlus *British Medical Journal* 330 (7492) 662-665

¹⁶ Boyle F et al *Clinical engagement and cross-sector collaboration project Research B.1 – Collaborative models of care (draft)* University of Queensland 2013

While the methodology is similar, in the UK, MOM has been driven by the acute care sector to address acute care priorities. This contrasts with *HealthPathways* which has enabled the primary care sector to be driving system reform. One interviewee said:

It has a big following in Britain but Map of Medicine is not GP focused – HealthPathways supports GPs at the point of care provision. So for a similar price and being based in our region, HealthPathways seemed like a better process.

The momentum that *HealthPathways* has already gained in Australia was also a consideration. Another comment was:

Many other Medicare Locals are using HealthPathways and we felt it was important to remain in step.

10 AML Alliance support for *HealthPathways*

As Australia's organisation for supporting the 61 MLs, AML Alliance is interested in providing appropriate support to MLs currently implementing *HealthPathways* as well as those with an interest in joining the program in future.

Although *HealthPathways* is being enthusiastically embraced in many regions across Australia, including the five that were the focus of this evaluation, not all MLs will find *HealthPathways* suitable for them and of those that do, some may not be ready to implement it. Amongst those consulted for this evaluation, there was a fair degree of unanimity that a national 'rollout' of the program would therefore not be appropriate and that *HealthPathways* must be initiated and implemented at the regional level for it to be effective. This comment reflects a commonly held view:

With it being imposed from above it probably wouldn't work. It needs to have ownership and be geared towards the local context. Each of the MLs does a slightly different thing because it's in response to their region's needs. It needs to be tailored by us for our region.

The evaluation identified a number of areas where there is potential for AML Alliance to add value and support to MLs throughout the implementation process including:

- Acting as an advocate for MLs who are considering implementing *HealthPathways*
- Supporting education in its use
- Supporting and engaging with ongoing evaluation of *HealthPathways* including engaging with evaluations currently being undertaken by ACI and Tasmania ML
- Supporting MLs to explore options for ongoing resourcing that will enhance the program's long term sustainability
- Collaborating with MLs in representing their interests at appropriate State and Commonwealth Government policy and reform forums

- Working with MLs wishing to join the *HealthPathways* program to negotiate contracts with the New Zealand agencies that enhance the affordability and sustainability of the *HealthPathways* program and support its broader uptake across Australia.
- Providing strategic overview and coordination of any national *HealthPathways* agenda.

11 Conclusion

A number of Australian Medicare Locals have chosen to implement the *HealthPathways* program to address acute demand issues, service blockages and fragmentation of patient care at the acute primary care interface. *HealthPathways* differs from other cross-sector collaboration programs because of its:

- Breadth of reach
- Local adaptability
- Primary care focus.

HealthPathways is being implemented as part of a broader redesign agenda and whilst it is too early to measure system-wide impacts from a user point of view, the program appears to have had impacts on:

- Collaboration between the acute and primary care sectors
- Clinician experience
- Support for GPs.

Growing awareness amongst clinicians of *HealthPathways*' value is reflected in growth in website visits. A range of potential benefits to consumers, GPs, LHNs, specialists and the health system as a whole have been identified.

Whilst users are optimistic about the programs three to five year sustainability, this is dependent on how MLs, LHNs and others are able to deal with some of the challenges to its sustainability identified through the evaluation.

12 Recommendations

The findings of the evaluation have informed the following recommendations.

Recommendation 1: Whilst a national 'rollout' of the HealthPathways program may not be appropriate, the AML Alliance supports MLs implementing *HealthPathways* through:

- i. Utilising the expertise of ML staff implementing HealthPathways in its advocacy and policy work relevant to the *HealthPathways* program.
- ii. Providing strategic overview and coordination of any national *HealthPathways* agenda
- iii. As part of its broader, cross-sector collaboration and engagement remit, supporting education in the use of *HealthPathways*
- iv. Supporting ongoing evaluation and research into the impacts of *HealthPathways* including engaging with evaluations currently being undertaken, for example the ACI and Tasmania ML evaluations
- v. Supporting the MLs to explore options for ongoing resourcing to enhance the program's long term sustainability
- vi. Collaborating with MLs in representing their interests at State and Commonwealth Government policy and reform forums relevant to the implementation of *HealthPathways*
- vii. Working with MLs wishing to join the *HealthPathways* community to enhance the affordability and sustainability of the *HealthPathways* program and support its broader uptake across Australia. This may include supporting MLs in obtaining legal or contractual advice or facilitating negotiation with the New Zealand agencies on behalf of multiple MLs.

Recommendation 2: MLs implementing *HealthPathways*:

- i. Ensure adequate resourcing is available to sustain the program over the medium to long term so that its full potential can be realised
- ii. Ensure stakeholders are aware of the context in which *HealthPathways* is being implemented and that they understand the potential effects of factors outside the program's scope of influence on the program's impacts
- iii. Continue to foster collaboration between LHNs and State and Commonwealth Governments in areas relevant to implementing and sustaining *HealthPathways*
- iv. Continue development of data collection activities that will demonstrate the impact of *HealthPathways* on the health system.

Appendix 1 – Interview participants

Name	Title	Organisation	Regional affiliation
Ian Anderson	Director	Streamliners, User documentation specialists	Australia and New Zealand
Fran Boyle	Associate Professor, School of Population Health, Faculty of Health Sciences	University of Queensland	AML Alliance
Sarah Bradfield	HealthPathways Program Coordinator	Central Coast NSW Medicare Local	Central Coast NSW
Dr Ben Cowie	Epidemiologist and Physician	Melbourne Health	Melbourne
Janelle Devereux	Manager, Service Development and Integration	Inner North West Melbourne Medicare Local	Melbourne
Andy Froggatt	Program Manager - Integration and Health Reform	Townsville/Mackay Medicare Local	Townsville/Mackay
Phil Godden	GP Clinical Editor/Clinical Leader	Central Coast NSW Medicare Local	Central Coast NSW
David Isaac	Manager, GP Liaison	St Vincent's Hospital Melbourne	Melbourne
Margaret Lynch	Clinical Director	Hunter Medicare Local	Hunter
Sarah Lythgoe	Clinical Editor & GP	Townsville Mackay Medicare Local	Townsville/Mackay
Amanda Martin	Clinical Improvement Manager	Central Coast NSW Medicare Local	Central Coast NSW
Frances Maxwell	Clinical Editor & GP	Barwon Medicare Local	Barwon
Marika Mackenzie	HealthPathways coordinator	Hunter Medicare Local	Hunter
Martin McCall-White	Head, Service Reform & Innovation	Barwon Health	Barwon
Margie McLeod	HealthPathways Coordinator	Barwon Medicare Local	Barwon
Sue Markham	Medical and Science Writer	Royal Australian College of	AML Alliance

Name	Title	Organisation	Regional affiliation
		General Practitioners	
Lyndall Mollart	Ante-natal GP shared care coordinator	Central Coast Local Health District & Central Coast Medicare Local	CCNSW
Allyson Mutch	Director, Bachelor of Health Sciences, School of Population Health	The University of Queensland	AML Alliance
Claire Neilson	Manager, GP Collaboration Unit	Central Coast Local Health Network	CCNSW
Dr Tilley Pain	Research Fellow & HealthPathways Clinical Reference Group Member	Townsville Hospital and Health Service	Townsville/Mackay
Dr Chris Pearce	Clinical Editor, Director of Research	Inner East Melbourne Medicare Local	Melbourne
Dr Richard Reed	Professor and Head, Discipline of General Practice Deputy Head, Promotion, Prevention and Primary Health Care	Flinders University	AML Alliance
Tracey Tay	Senior Staff Specialist and Clinical Lead, Innovation Support	Hunter New England Local Health Network	Hunter
Jason Trethowan	CEO	Barwon Medicare Local	Barwon
Jeff Urquhart	GPLO & Clinical Editor	Barwon Medicare Local	Barwon
Martin Wilkinson	Director of Primary Care & Clinical Services	Inner East Melbourne Medicare Local	Melbourne
Charlotte Young	PhD Candidate and Research Officer, School of Population Health	The University of Queensland	AML Alliance

Appendix 2 – Summary of survey responses

Participant demographics

The evaluation survey was distributed electronically by each ML to its *HealthPathways* contacts. A link to the survey was placed on the CCNSW ML *HealthPathways* website. 204 respondents commenced the survey and 180 completed it (88.2%). Table I shows the numbers of respondents by ML region, including the number aware of *HealthPathways* and the number who had used it. Only those who were aware of and had used the website progressed beyond the demographics section of the survey.

Of the 180 respondents who completed the survey, only 57 were of aware of and had used the *HealthPathways* website – the detailed analysis is based primarily on these responses and should be considered in the light of this relatively low response rate.

Table I – Number of survey respondents by ML region

Medicare Local region	Number of respondents	Number of respondents aware of <i>HealthPathways</i> website	Number of respondents who have used the <i>HealthPathways</i> website
Barwon	18	18	14
Central Coast NSW	152	43	23
Hunter	15	15	14
Melbourne	17	16	6
Townsville Mackay	1	1	0
Not stated	1	1	1
Total	204	93	57

The response rate is likely to have been affected by the following factors:

- At the time the survey was distributed, the *HealthPathways* program had not been launched in Melbourne or Townsville Mackay
- Whilst the Central Coast NSW region had a significantly higher response rate than the other regions, the majority of these respondents were either unaware of or had not used the *HealthPathways* website. Of the 153 CCNSW respondents, 109 were not aware of *HealthPathways* and a further 20 respondents were aware of it but had not used it. Of these, all but two were Local Health Network personnel
- An evaluation had been undertaken in the Hunter region shortly before this AML Alliance evaluation commenced. The overlapping target population of the two evaluations may have impacted on the response rate.

Given the method of survey distribution and the spread of organisations in which the respondents are employed it is likely that a significant number of respondents have been involved with *HealthPathways* development in some form. This may bias the survey responses and the analysis should be considered with this in mind.

Table II – Number of survey respondents by type of organisation

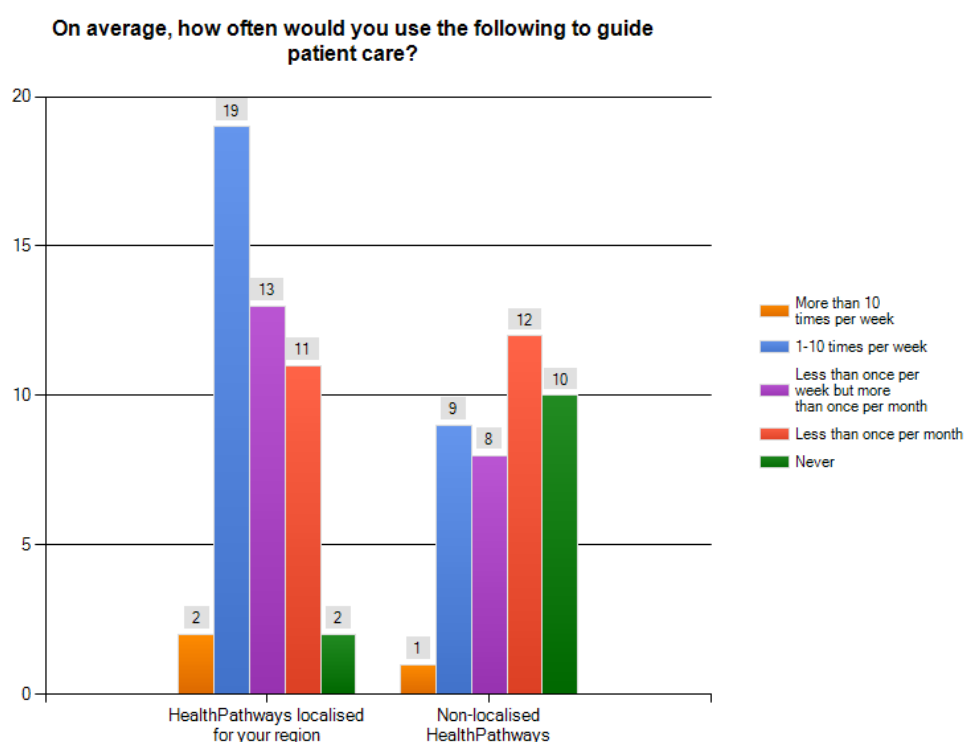
Employing organisation	Number of respondents	Number of respondents aware of <i>HealthPathways</i> website	Number of respondents who had used the <i>HealthPathways</i> website
Local Health Network	159	50	23
General practice	32	32	31
Medicare Local	30	30	23
Specialist private medical practice	2	2	1
University	2	2	1
Private allied health practice	1	1	1

Table II lists survey respondents by type of organisation. Respondents were invited to list all of the organisations they work for and these have been counted separately. As noted earlier, there were a large number of respondents from local health networks however the majority of these were not aware of *HealthPathways* and less than half of those who were aware, had used the website – the drop off in usage amongst hospital staff who are aware of the program is consistent with its target audience being predominantly GPs. Both awareness of and use of the *HealthPathways* website was strongest in the general practice sector.

Patterns of usage

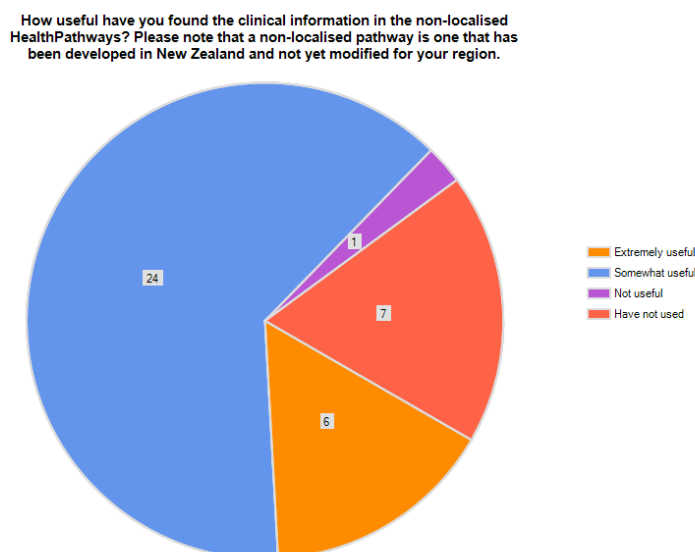
Chart I shows that localised pathways are used more frequently than non-localised pathways with 19 of 48 respondents reporting that they use localised pathways one to ten times per week whilst only nine respondents use non-localised pathways one to ten times per week.

Chart I – Frequency of use of localised and non-localised pathways



Despite the fact that the non-localised pathways are used less than the localised pathways, chart II shows that 16% of respondents (n=6) rated the clinical information in the non-localised pathways as extremely useful and 63% (n=24) rated it somewhat useful.

Chart II - Usefulness of clinical information in the non-localised pathways



Participant views on impacts of *HealthPathways* to date

Referral

Only three respondents reported receiving one or more referrals since the launch of *HealthPathways* in which it was evident the referrer had referenced a pathway. However a number of respondents either don't receive referrals (because they are GPs) or *HealthPathways* has not yet launched in their region.

Collaboration

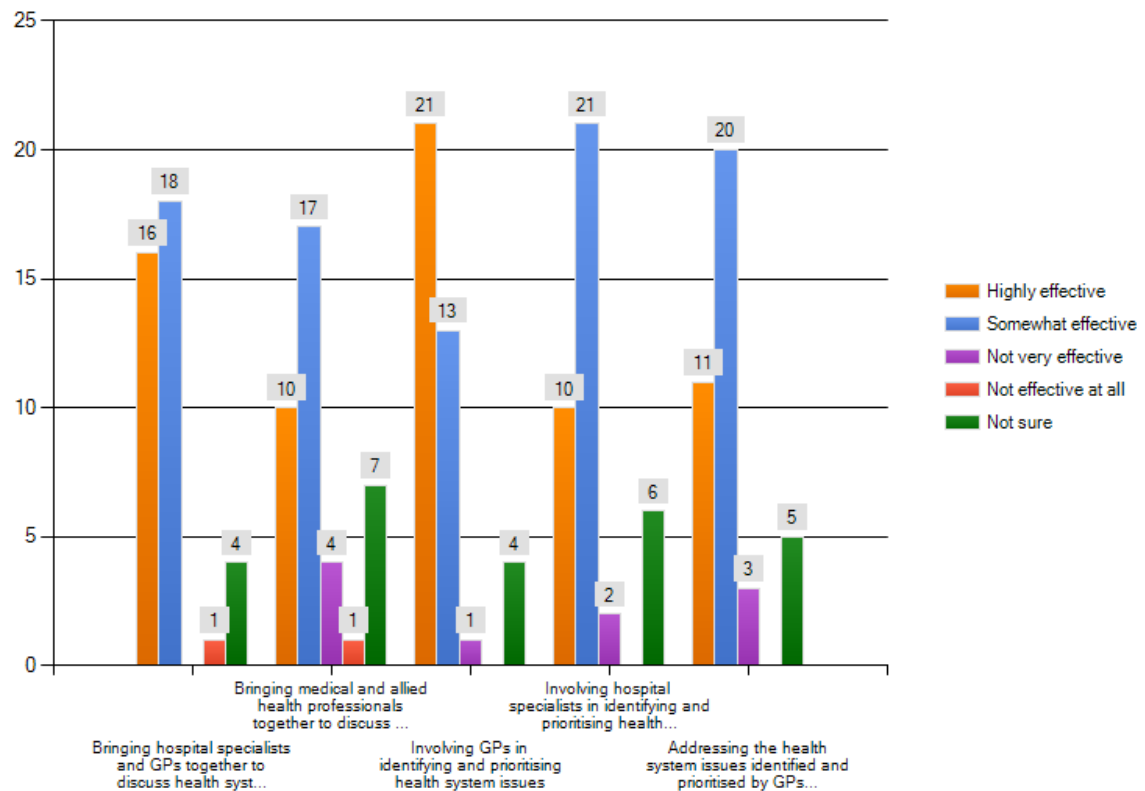
Respondents were asked to rate the effectiveness of *HealthPathways* in the following areas:

- Bringing hospital specialists and GPs together to discuss health system issues
- Bringing medical and allied health professionals together to discuss health system issues
- Involving GPs in identifying and prioritising health system issues
- Involving hospital specialists in identifying and prioritising health system issues
- Addressing the health system issues identified and prioritised by GPs and medical specialists

Participants gave the highest effectiveness rating to Involving GPs in identifying and prioritising health system issues. The majority perceived it to be somewhat effective in the other areas. A few respondents felt it was not very effective (n=10) or not effective at all (n=2) in each area.

Chart III – Effectiveness of the program

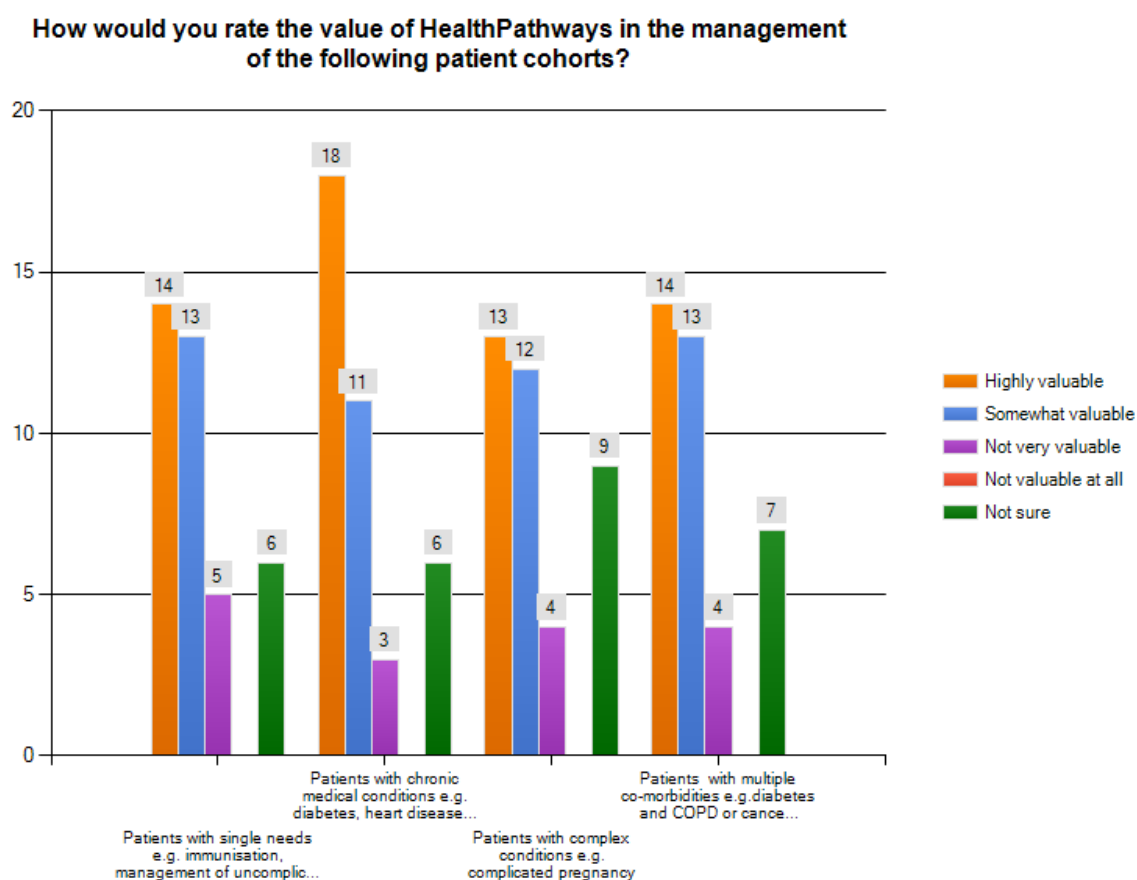
How would you rate the effectiveness of the HealthPathways program in the following areas?



Patient benefit

The patient cohort for whom *HealthPathways* was rated most 'highly valuable' was patients with chronic medical conditions such as diabetes, heart disease, Chronic Obstructive Pulmonary Disease (COPD) and arthritis. There was very little difference between ratings of effectiveness for patients with complex conditions, single needs or multiple co-morbidities. There were no ratings of 'not valuable at all' for any of the patient cohorts.

Chart IV – Value of the *HealthPathways* program



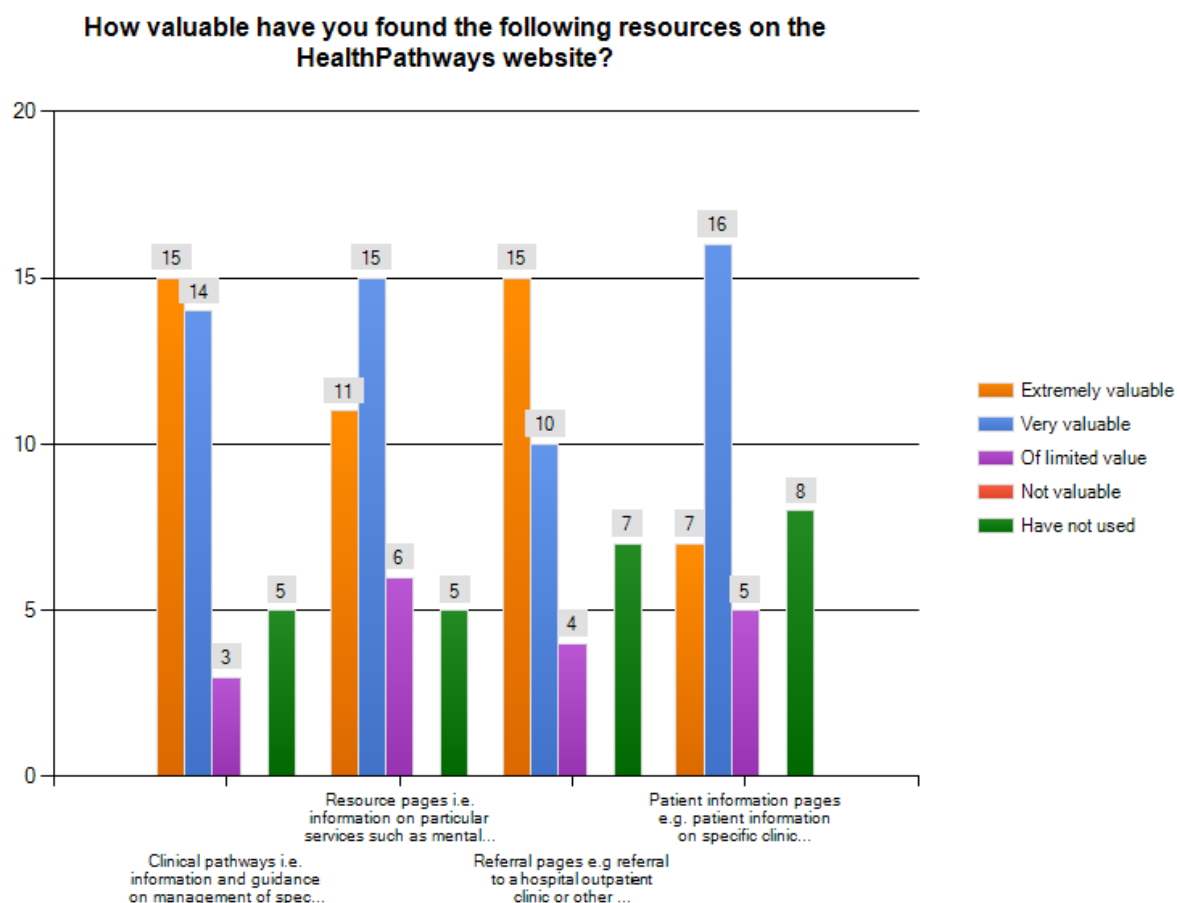
Value to clinicians

Chart V shows that the resources on the website considered most valuable are the clinical pathways themselves - that is the pages that contain information and guidance on management of specific clinical conditions. 78% of respondents rated these 'extremely' or 'very' valuable.

Seventy percent also rated the referral pages as being 'extremely' or 'very' valuable - this is consistent with the findings that localised pathways are used more frequently than non-localised pathways.

The patient information pages were rated as 'very' valuable or 'extremely' valuable by 63% of respondents whilst 22% had not used the patient information pages. None of the *HealthPathways* resources were rated 'not valuable' by any participants.

Chart V – Value of the *HealthPathways* resources



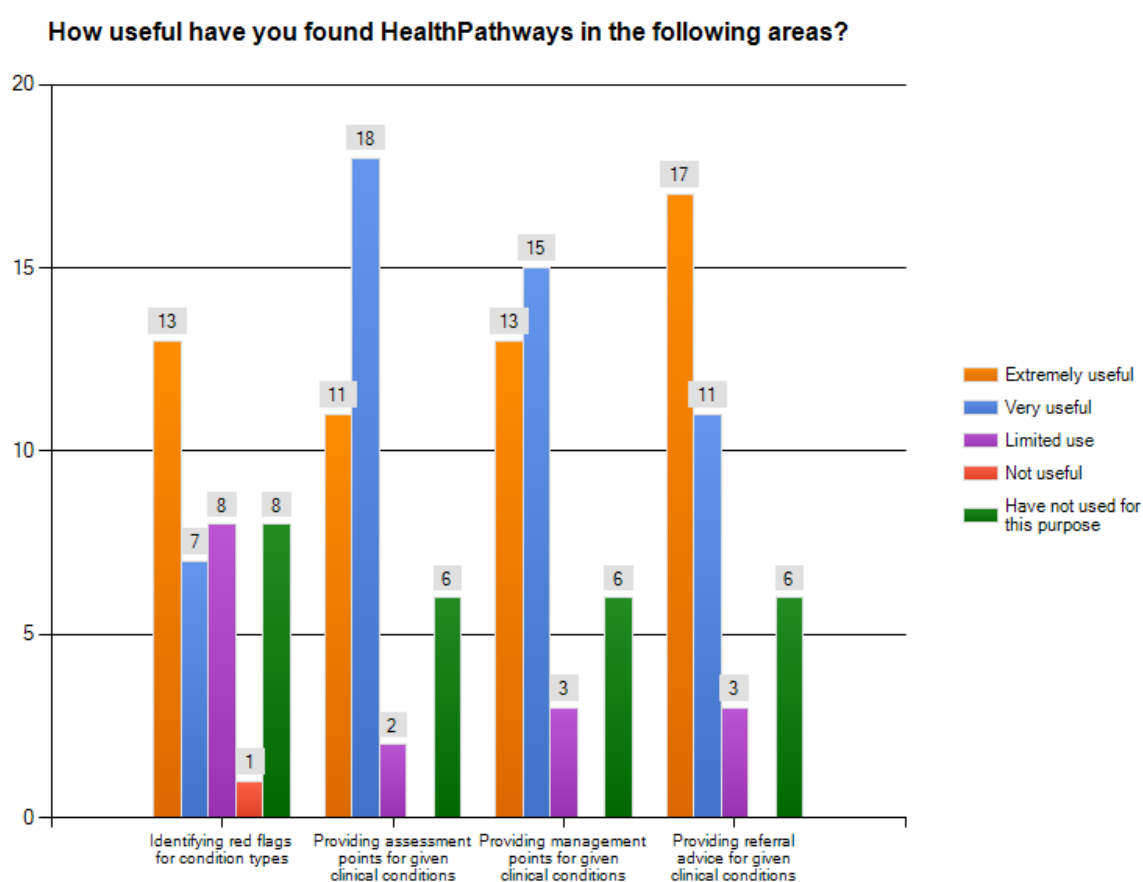
Respondents were asked to rate the usefulness of *HealthPathways* in the following areas:

- Identifying red flags for condition types
- Providing assessment points for given clinical conditions

- Providing management points for given clinical conditions
- Providing referral advice for given clinical conditions

HealthPathways was rated extremely useful for providing referral advice for given clinical conditions by 46% and very useful by 30% of respondents. This is again consistent with other responses on the usefulness of the localised pathways. Providing assessment and management points were considered very useful by most respondents (49% and 41% respectively). Identifying red flags for conditions was considered extremely useful by 45% of respondents but also attracted the highest number of respondents who said that it was of limited or no use for this purpose.

Chart VI – Usefulness of *HealthPathways* in different areas of clinical practice



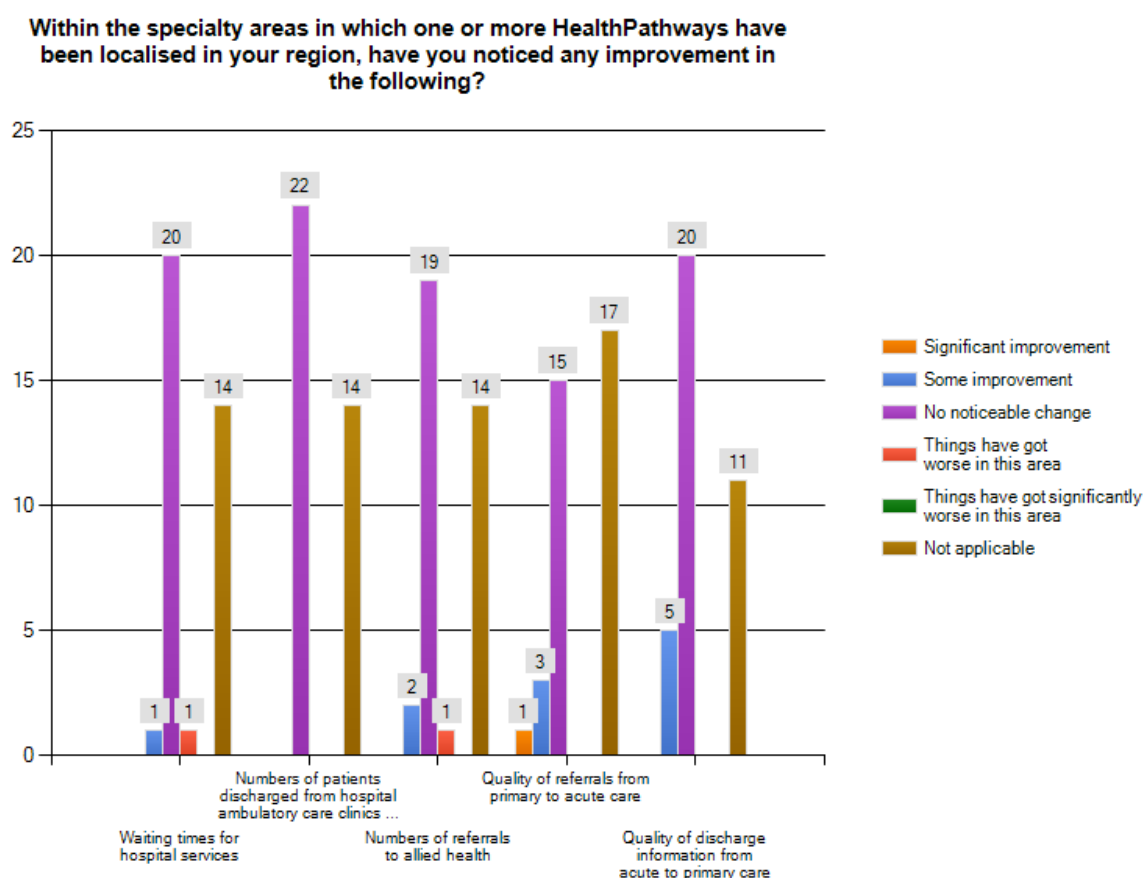
System impacts

There is no indication that *HealthPathways* has had an observable impact at this stage on waiting times for hospital services or numbers of patients discharged from hospital ambulatory care clinics to primary care services. Most comments indicate that respondents perceive it to be too early in the *HealthPathways* implementation process for outcomes of this nature to be measured. The difficulty of attempting to attribute system impacts to any one reform initiative is illustrated by the following comment:

Health pathways in its current stage of development is not well measured by these indices as it is only one small part of the process required for real health redesign success.

A small number of participants have noted some improvement in numbers of referrals to allied health (two respondents), quality of referrals from primary to acute care (three respondents) and quality of discharge information from acute to primary care (five respondents). Chart VII shows all responses to the question on system impacts.

Chart VII – System impacts of *HealthPathways*



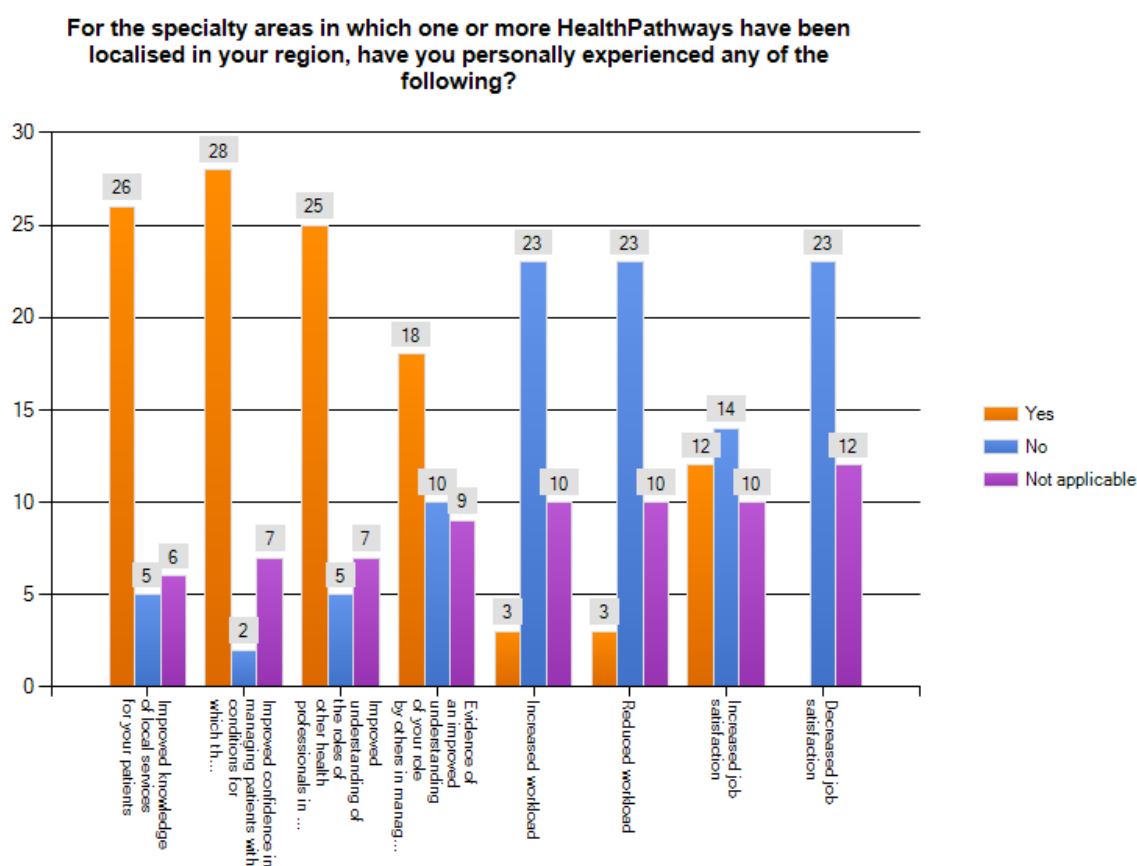
Clinician experience

Although it is difficult to demonstrate system impacts, respondents reported some changes in their personal experience of patient care since using *HealthPathways*. As shown in chart eight, for the specialty areas in which one or more *HealthPathways* have been localised in their regions respondents have personally experienced the following:

- Improved confidence in managing patients with conditions for which there is a pathway (76%)
- Improved knowledge of local services for your patients (70%)
- Improved understanding of the roles of other health professionals in managing conditions for which there is a pathway (68%)
- Evidence of an improved understanding of your role by others in managing conditions for which there is a pathway (49%).

And whilst there has been no significant change in workload, 12 respondents indicate an increase in job satisfaction (33%)

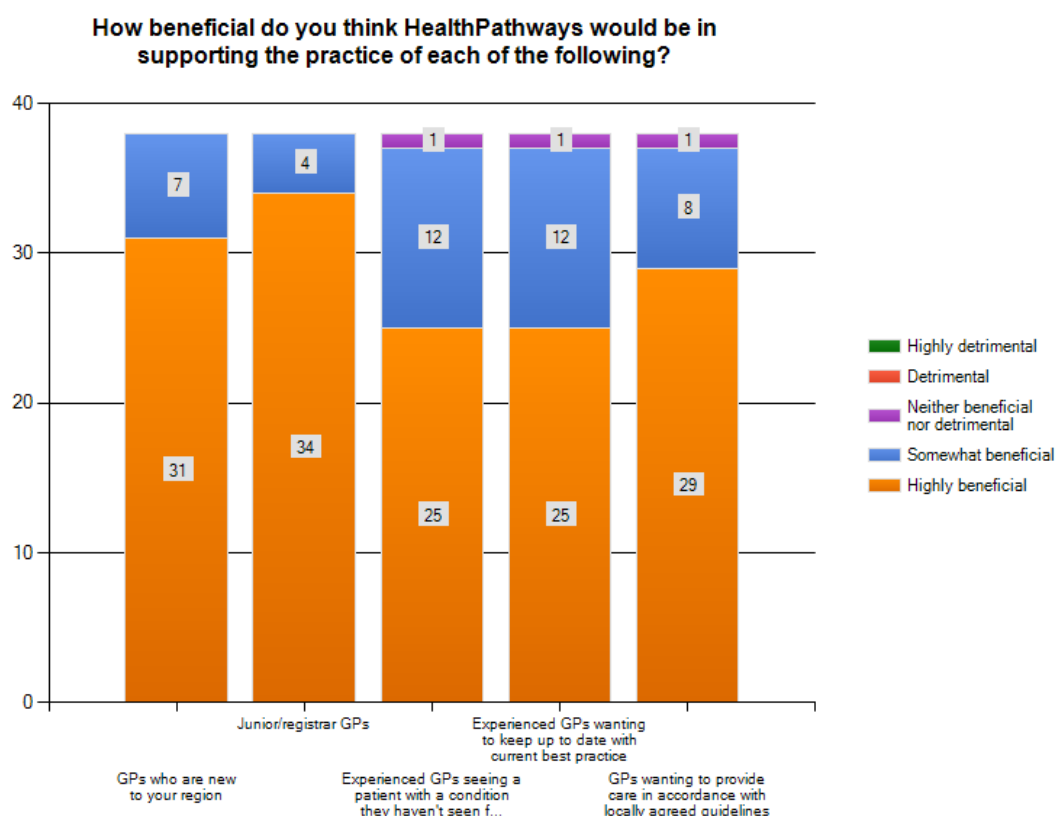
Chart VIII – Impact on clinician experience



Supporting practice

Respondents were asked how beneficial they thought *HealthPathways* would be in supporting the practice of a range of sub-groups of GPs as shown in chart nine. Whilst respondents thought the initiative would be of most benefit to junior/registrar GPs and GPs who are new to a region, the majority indicated that it would be highly beneficial in supporting practice for all of the sub-groups listed.

Chart IX – Benefits to different groups of GPs



Sustainability

Most survey respondents rated the program's sustainability over the next three to five years as either highly sustainable or somewhat sustainable (see chart X). There was a high level of consistency in respondents' views regarding the main factors that will impact on the program's sustainability over this period - currency and engagement.

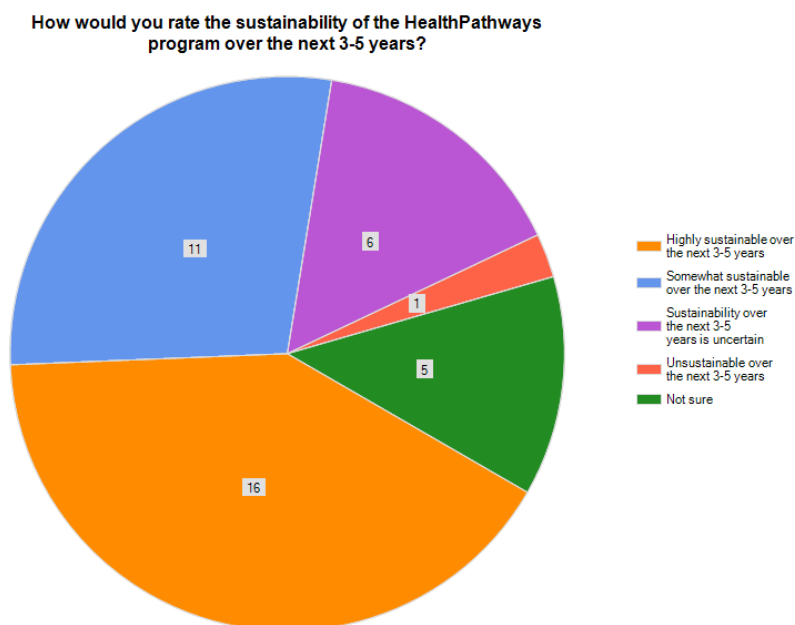
Keeping the pathways up-to-date and continuing to develop new pathways that are responsive to locally identified needs was the most commonly noted factor in ensuring the program's sustainability. This was linked with ensuring that the program continues to receive adequate funding and resourcing

and that governance remains strong. It is viewed as a project that will require time and commitment to become embedded in the system.

Maintaining engagement of GPs, specialists, governments and hospitals is another critical key to sustainability identified by participants. Engagement is multi-faceted and includes ensuring that:

- Appropriately experienced and skilled clinicians are available to contribute to pathway development,
- GPs and other clinicians are aware of and use the pathways as a primary source of information
- Local LHNs invest in delivering the accompanying reforms required to achieve system-wide transformation.

Chart X – Sustainability over five years



Barriers to successful implementation

The raw data from the survey identified a variety of potential barriers to the successful implementation of the *HealthPathways* program. These are consistent with the factors impacting on sustainability including:

- Resistance to change amongst:
 - GPs - some of whom may need encouragement, education and support to practice in a new way
 - Hospital clinicians - some of whom have been observed to lack confidence with the care available in the primary sector, resulting in specialists continuing to follow up patients that

could be referred back to their GPs and ultimately leading to access blockages for new patients

- Commitment of resources:
 - Specialist clinicians working in hospitals are thought to be particularly 'time poor with heavy patient workloads' and therefore limited in their availability to contribute to pathway development.
 - LHNs were viewed as having competing agendas and limited engagement with the program.
 - The *HealthPathways* teams themselves were viewed by some respondents as having 'a lack of resources' to localise and develop new pathways.
- Overlapping jurisdictions and uneven boundaries between different healthcare providers such as MLs and LHNs. One comment was:

It is still unclear how implementation will work in areas such as Melbourne where the boundaries and catchments of LHNs and MLs are overlapping and in time this may prove to be a barrier to optimal implementation

- The capacity of the broader system to address service improvement issues through enabling technologies or service redesign
- Maintaining consistency of locally agreed practice and failure to address observed inconsistencies e.g. hospitals contacting GPs who have made inappropriate referrals and supporting them to adhere to the agreed pathway.

Enablers of successful implementation

Respondents also articulated some potential enablers of the successful implementation. Again, these are consistent with the impacts on sustainability:

- Investing resources in getting pathways developed quickly to maintain program momentum.
- Enhancing the capacity of time-poor clinicians to continue to be involved in pathway development through prioritising and properly resourcing their involvement
- Linking with enabling technologies such as eHealth initiatives
- Continuing to grow the awareness of the program across sectors through dissemination of information and education, especially to GPs

Potential risks

- One risk identified suggests that a premature launch of *HealthPathways* websites before there is a critical mass of high quality, localised pathways may lead to reduced GP engagement. Likewise, following release, pathways must be kept up to date to maintain GP engagement. Having started

to use them, if GPs cease to find the pathways a reliable primary resource of relevant, local information, they will be hard to re-engage with the process

- Some participants see that the *HealthPathways* program may lead to reduced referral rates to LHNs due to GPs 'viewing themselves as specialists'. Others see referral rates to LHNs increasing as a result of *HealthPathways*. This may result in 'overburdening the LHN which has not a chance of improving staff numbers to meet demand'
- Creating an environment of 'protocol driven, cook-book medicine' which may see less experienced clinicians 'rely on the pathway as a substitute for broadening their underlying knowledge and understanding'.

Benefits of implementation

If the program can be sustained, survey respondents envisage a number of benefits arising. Ultimately these all converge in better care for individual patients and improved outcomes for the community more broadly. They include:

- Improved communication and relationships between GPs, specialists, hospitals and allied health professionals
- More efficient use of local resources resulting in improved patient access to appropriate services and information
- Fewer unnecessary referrals to outpatient clinics and fewer patients undergoing unnecessary investigations
- Improved transfer of care between settings
- Improved consistency and coordination of practice across a region which more closely approaches best practice

And finally...

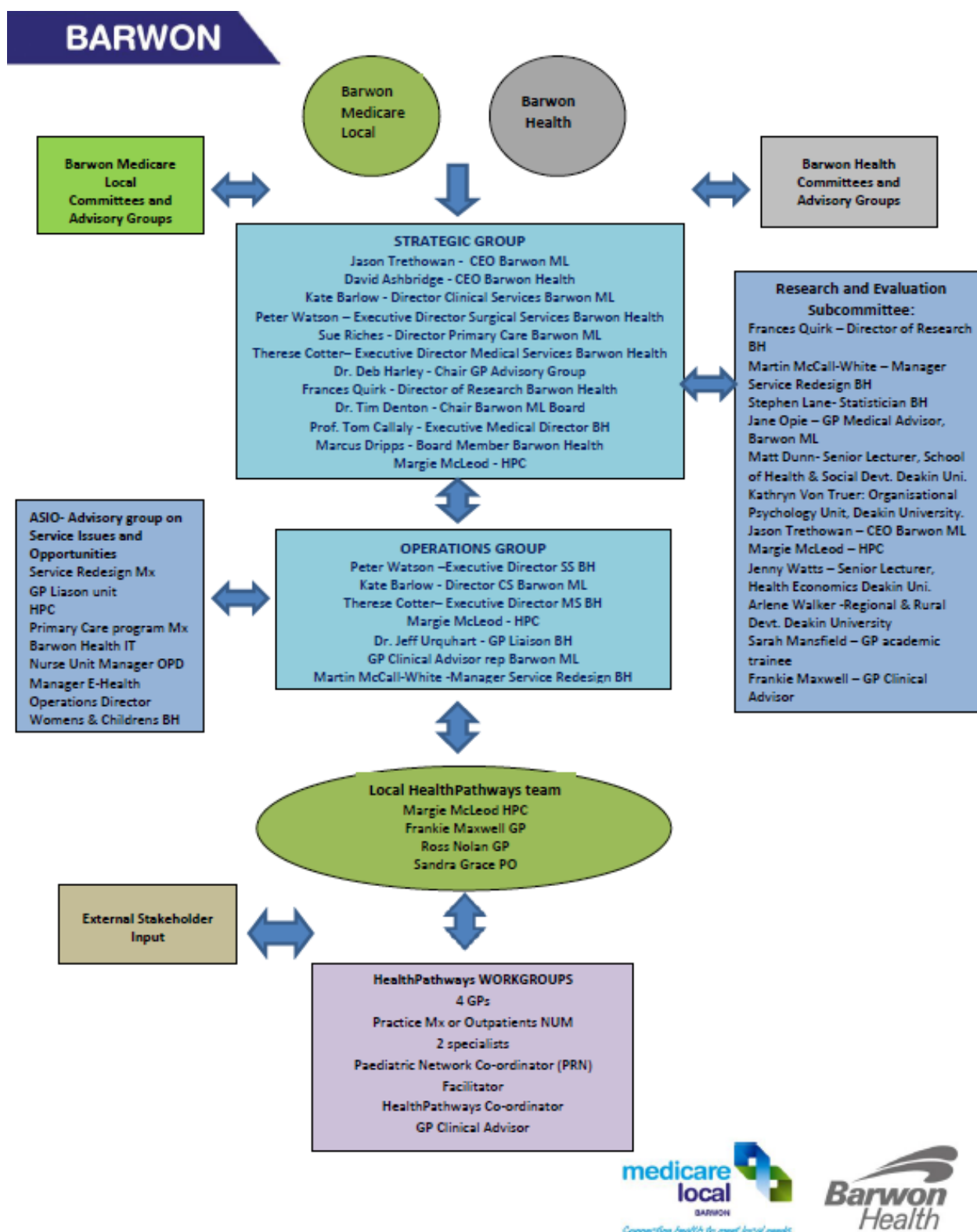
Other suggestions and comments about the implementation of *HealthPathways*:

- Marketing efforts should be made so GPs and maybe patients are aware of these processes
- The ML needs to listen to its GPs more in the planning, implementation, promotion and development of this tool
- It REALLY needs to be kept up to date.
- Wider access to more GPs for earlier feedback on improving the system
- I have only seen the New Zealand version and it is still in implementation phase. Managers and specialists have been included, although essential, I feel that the exclusion of the grass roots nurses and allied health will hinder the process. We all know that what actually happens on the ground is not necessarily reality. It will lead to a lag and continued update of the system.

- Keep going
- Need to take the next step and look at creative ways the problems can be solved. E.g. long wait times for certain specialties - could allied health, trained GPs assist with triage or assessment.
- This is a timely opportunity much needed by our health consumers to ensure our finite resources can best meet the needs of the enlarging older population in this time of high tech, expensive medicine needing to be delivered equitably across our community with vastly variable financial means
- Just that it's a great program.
- Good clinical staff helping to develop and implement
- Would like to see big gaps filled, such as Haematology and Mental Health
- Please keep it, it has made my life sooooo much better!!
- Needs to be user friendly and we need to see that it is relevant to our practice, not just in the areas we know well.
- Has to be integrated into work plans so time is allocated
- Keep it going!
- In time we need to be more inclusive of allied health professionals
- I think localised HealthPathways are very useful and love using them
- Develop tools to assist and maintain care back to GPs with triggers to allow seamless referral to acute setting if needed

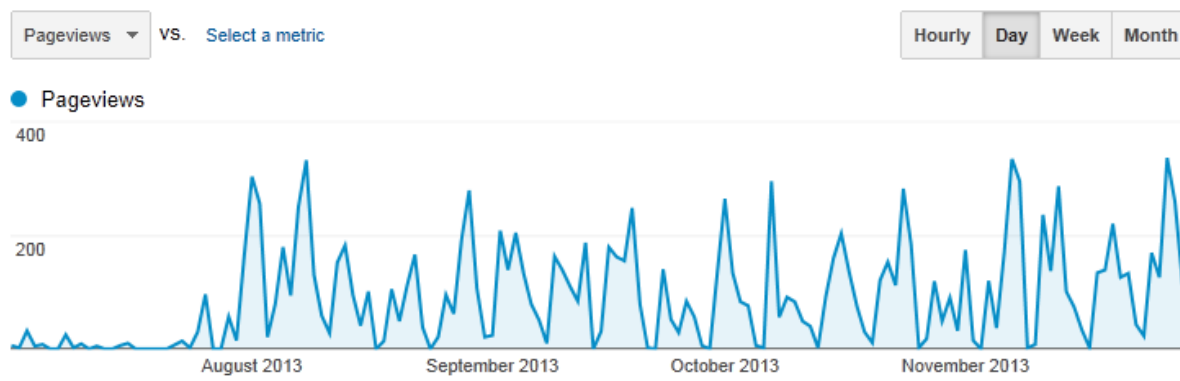
Appendix 3 – Sample governance structure

This example has been included with the permission of Barwon Medicare Local

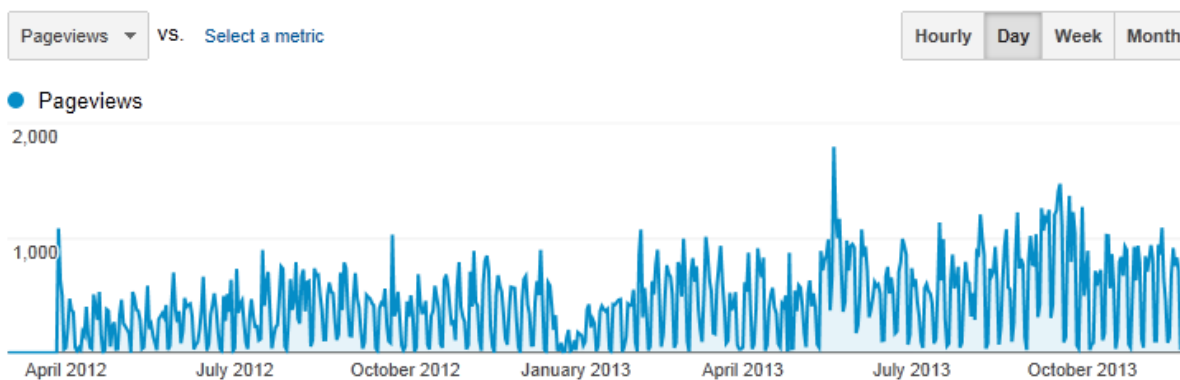


Appendix 4 – *HealthPathways* page views since launch

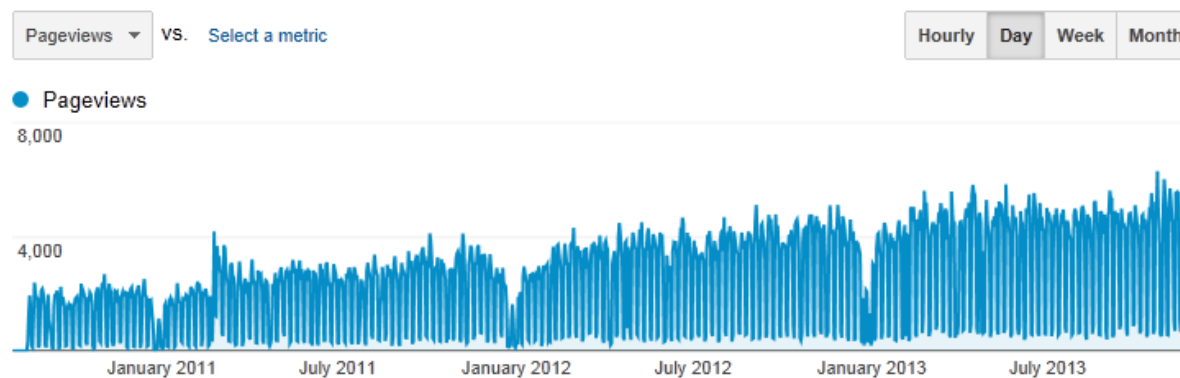
Barwon region



Hunter region



Canterbury region



Appendix 5 – Top 20 pathways viewed since launch

In the Barwon region all of the top 20 pathways are localised pathways and in the Hunter region 18 were localised, two were not (atrial fibrillation and chest pain).

Barwon		Hunter		Canterbury	
Pathway	Page views	Pathway	Page views	Pathway	Page views
Enuresis in Children	206	Routine antenatal care	2925	Heavy or irregular menses	9,666
Referral for allied health services	173	Referral to Maternity & Gynae OP	2269	Cognitive impairment	7,989
Constipation in children	172	Cognitive impairment	1068	Colorectal symptom pathway	7,935
Hip Osteoarthritis	169	Suicide risk	996	Obstructive sleep apnoea	7,287
Shoulder pain	163	COPD	929	Cellulitis	6,037
Unsettled infant	162	Persistent non-cancer pain	902	Pertussis (whooping cough)	5,395
Referral to paediatric rooms	127	Diabetes	848	Atrial Fibrillation	5,275
Referral to orthopaedic services	126	Osteoporosis	821	Renal Colic	5,057
Rotator cuff disorders	123	Referral to Gastroenterology	791	Referral to Gynaecology & Obstetrics	5,048
Frozen shoulder	114	Cardiovascular service referrals	759	Termination of Pregnancy	4,772
Knee Osteoarthritis	114	Referral to Orthopaedic Outpatients	726	Polycystic Ovarian Syndrome	4,749
Heart murmurs in children	106	Antenatal care - routine	684	Education services (GPs)	4,626
Child with a limp	95	Urinary tract infection	659	Canterbury Primary Earthquake Group	4,583
Croup	95	Psychosis	633	Deep vein thrombosis	4,455
UTI in children	95	Cellulitis	473	Osteoporosis	4,294
Hip and knee joint replacement	85	Closing the gap service directory	621	Pertussis vaccine for pregnant women	4,262
AC joint disease	78	Acute chest pain	609	Constipation in children	4,256
Reflux and GORD	75	Geriatric medicine referrals	599	Sub fertility	4,241
Immunisation - childhood	74	Falls prevention	587	Hyperthyroidism	4,240
Emergency referrals	64	Atrial fibrillation	579	Urinary incontinence	4,071

Appendix 6 – Sample health pathway

Navigation of the pathways is enhanced by consistency of style and layout as shown by this sample page from the Canterbury *HealthPathways* website.

HealthPathways CANTERBURY

Search Back Print Send Feedback

Constipation in Children

About constipation in children

Assessment

1. **Take a history.**
2. **Examination:**
 - Palpation of abdomen. A palpable stool in the descending colon is suggestive of **faecal impaction**.
 - **Inspection of anus**, especially in infants.
 - Check spine and lower limb reflexes.
 - Rectal examination is not necessary in general practice.
3. Investigations are not necessary as diagnosis is made following history and examination.

Management

1. **Education and demystification.**
2. **General measures:**
 - Ensure **adequate fluid intake**.
 - Fruit juice containing sorbitol (e.g., prune, pear, or apple) or kiwifruit (e.g., KiwiCrush), may be sufficient to soften the stool.
 - Ensure adequate exercise.
 - Establish **regular toileting**.
3. **Laxatives** for maintenance.
4. Consider **disimpaction** for faecal impaction when:
 - Palpable mass
 - Soiling
 - Abdominal pain and vomiting
 - Urinary retention
5. **Anal fissures.**
6. **Follow up:**
 - Plan regular review with the family to monitor progress and adjust medication as needed (maybe 1 to 2 weekly). This may be by phone.
 - Aim to wean medication when the child has been regularly passing soft formed stools.
 - Involve your practice nurse, Well Child provider, **Public Health Nurse**, or **Continence Service for Children** as appropriate.

Request

Refer to Child Health Services if:

- suspected organic cause.
- faecal impaction which has not responded to disimpaction.
- the child has been receiving adequate doses of medication but treatment is not effective.

Information

[HealthInfo](#)

[Clinical Information](#)

[References](#)

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Appendix 7 – Flow chart from sample pathway

This flow chart from one of the Canterbury pathways demonstrates how the clinical information from the non-localised pathways is useful to clinicians.

